Stations and Observations

Stations are sited in stable, open locations.

Instruments are calibrated to NIST standards.

Triplicate sensor configuration for the primary measurements of temperature and precipitation

- internal consistency assures quality
- redundancy protects continuity

Ancillary measurements support the primary measurements

- global solar
- surface IR temperature
- low-level wind
- wetness

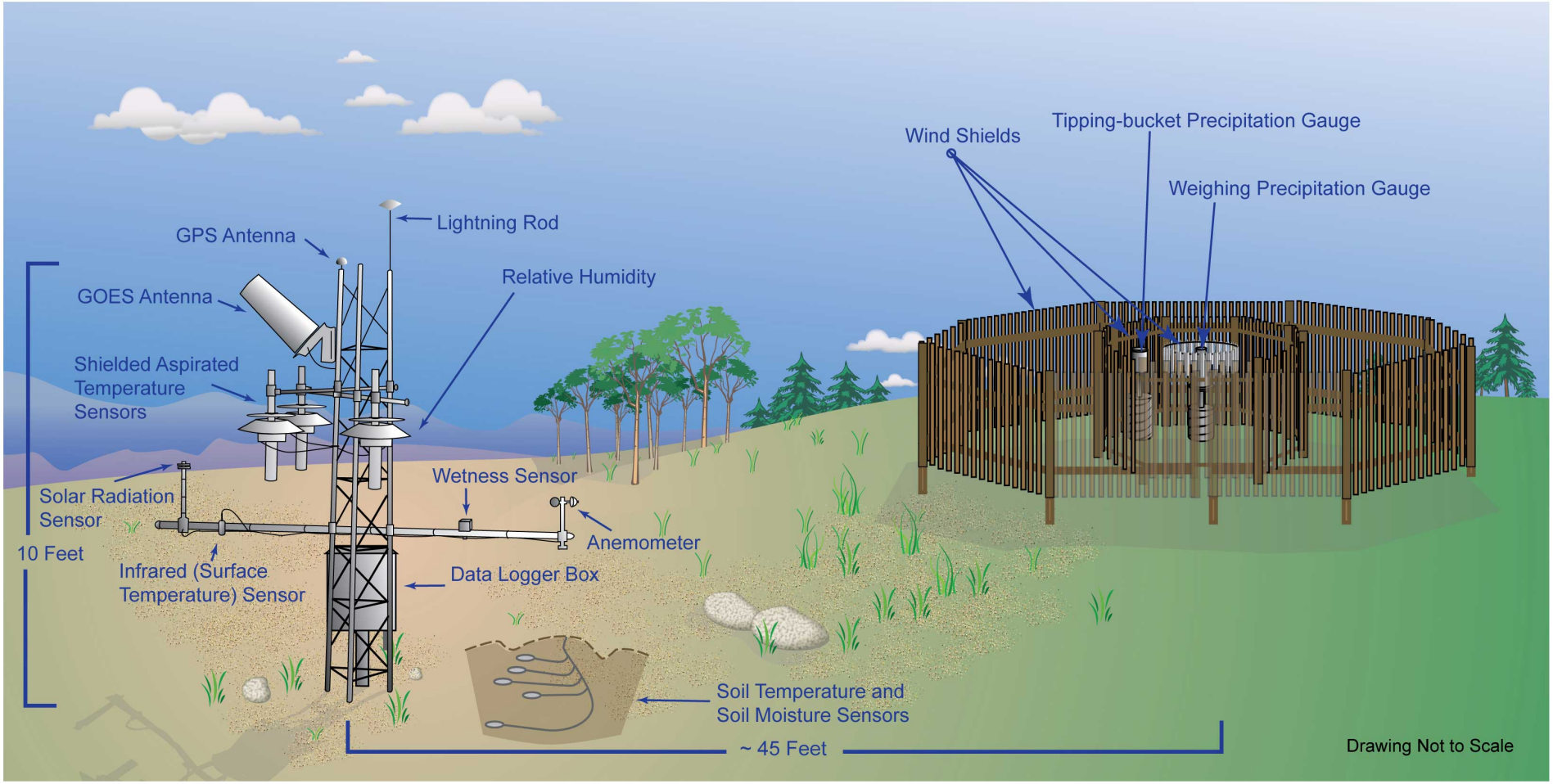
Additional measurements

- soil moisture
- soil temperature
- relative humidity

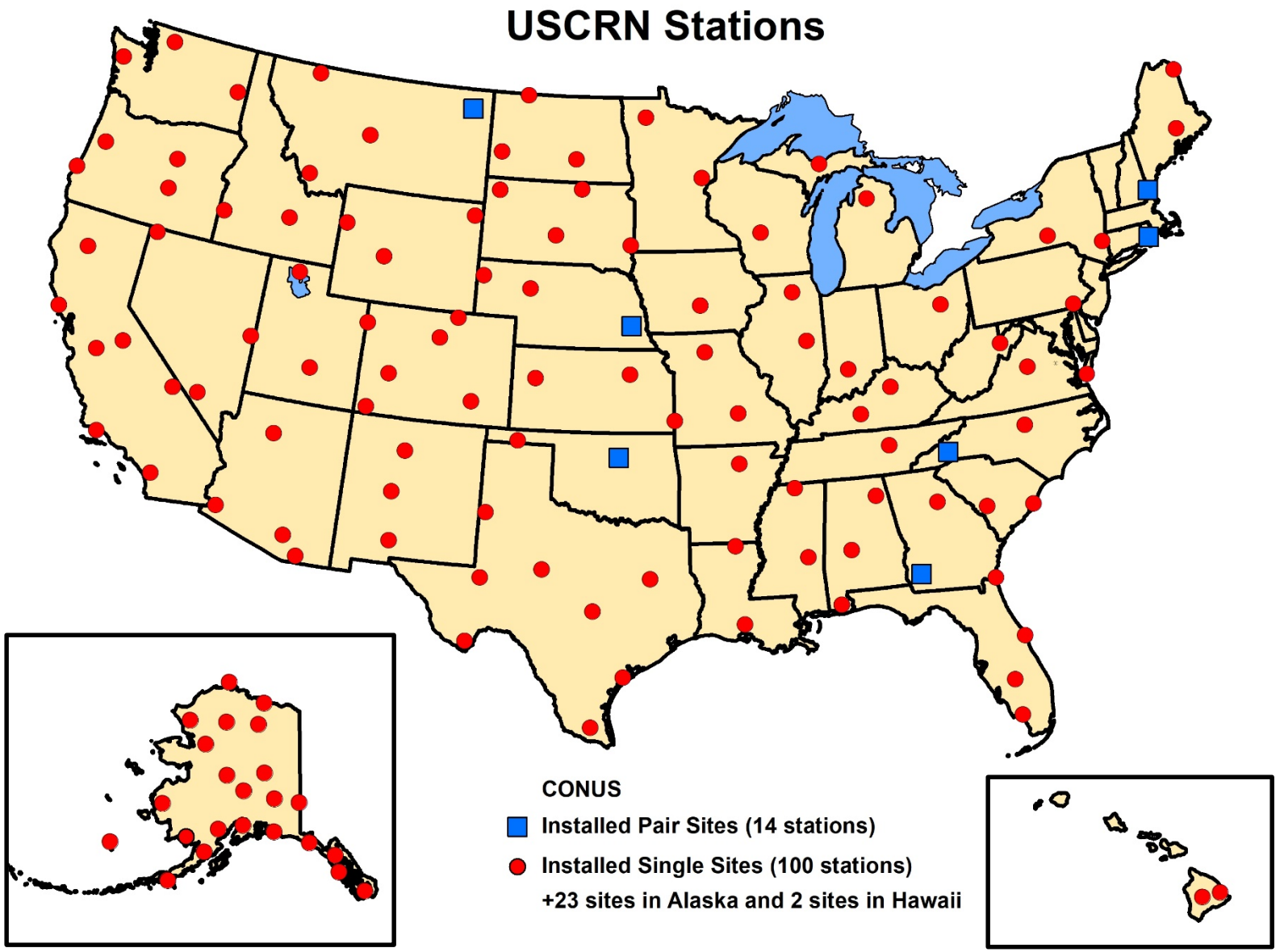
Data are acquired, processed and re-distributed hourly.

US Climate Reference Network

Instruments at a Typical USCRN Station



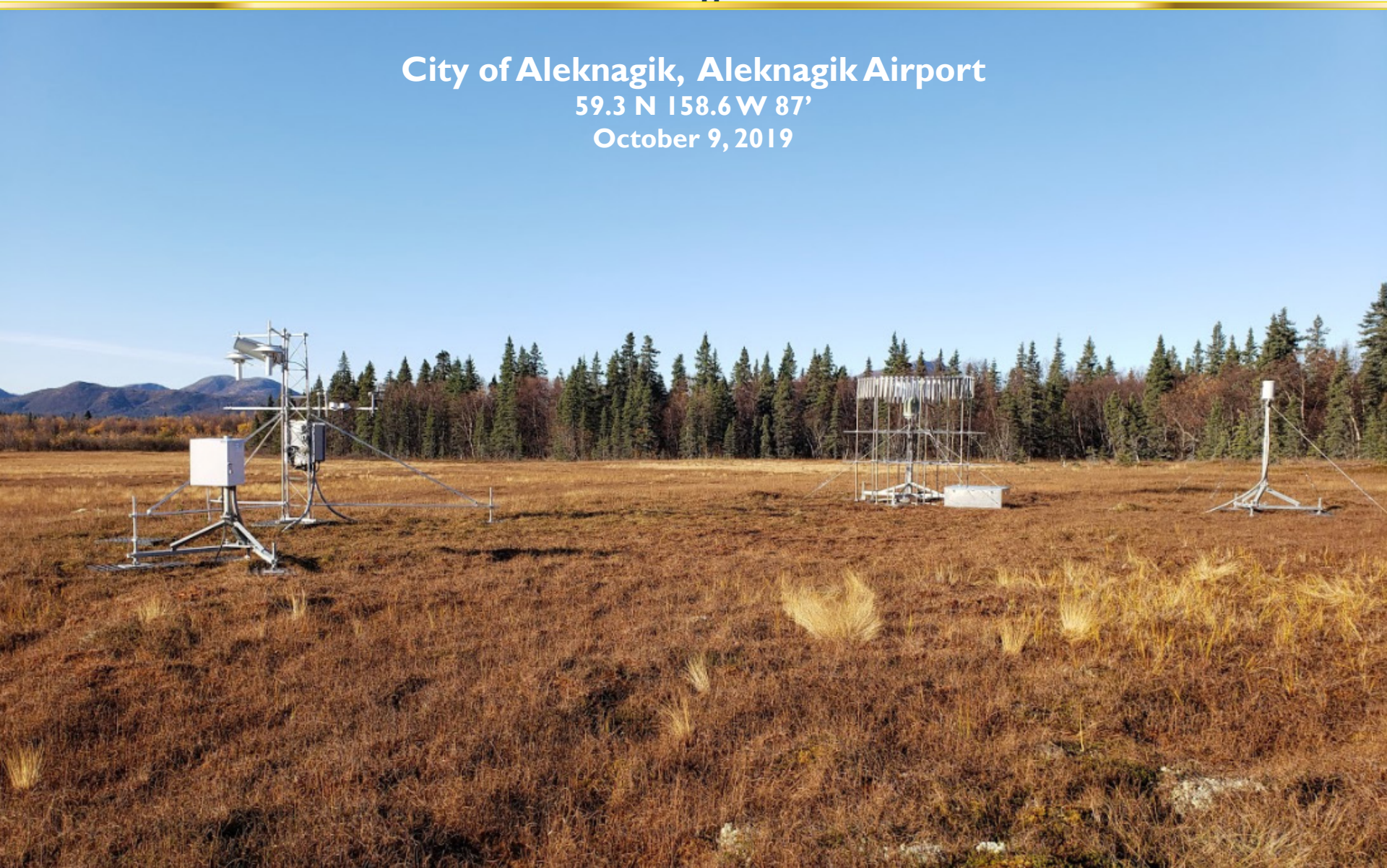
US Climate Reference Network



US Climate Reference Network

Non-commissioned

AK Aleknagik 1NNE



US Climate Reference Network

AK Bethel 87 WNW



US Climate Reference Network

AK Cordova 14 ESE



US Climate Reference Network

AK Deadhorse 3 S



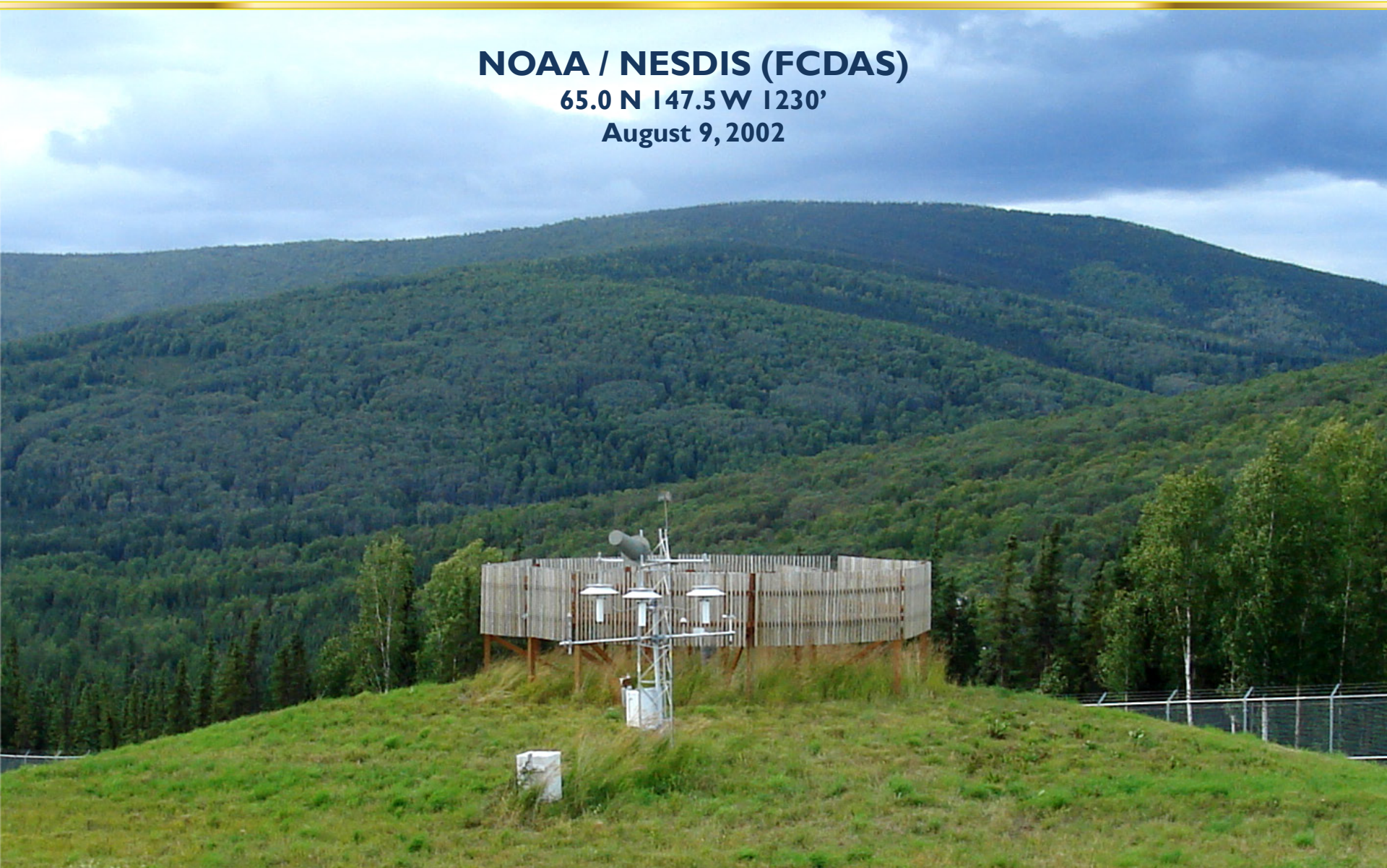
US Climate Reference Network

AK Denali 27 N



US Climate Reference Network

AK Fairbanks 11 NE



US Climate Reference Network

AK Glennallen 64 N



US Climate Reference Network

AK Gustavus 2 NE



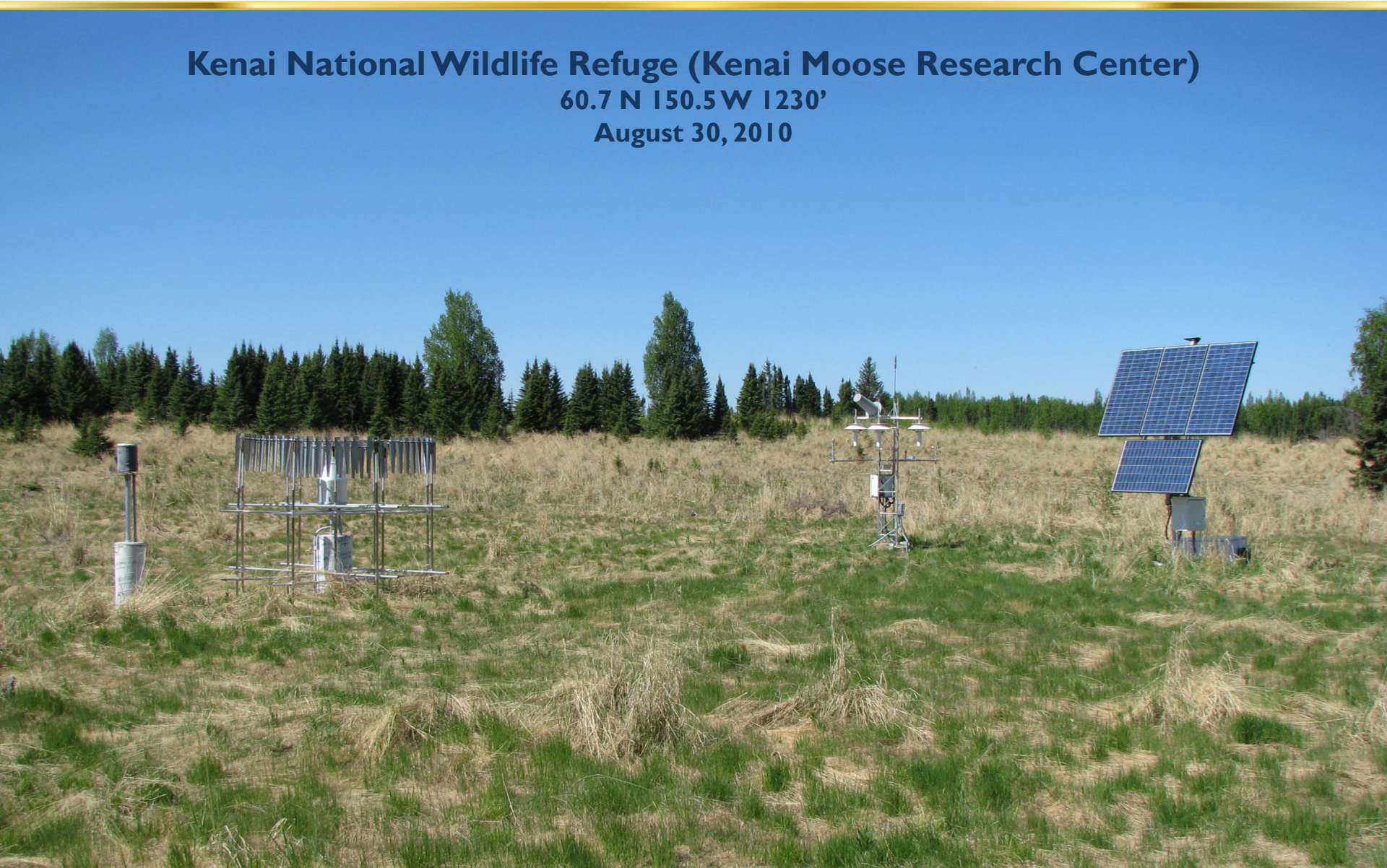
US Climate Reference Network

AK Ivotuk 1 NNE



US Climate Reference Network

AK Kenai 29 ENE



US Climate Reference Network

AK King Salmon 42 SE



US Climate Reference Network

AK Metlakatla 6 S

National Weather Service (Annette Island WSO)

55.0 N 131.6 W 105'

July 26 2012



US Climate Reference Network

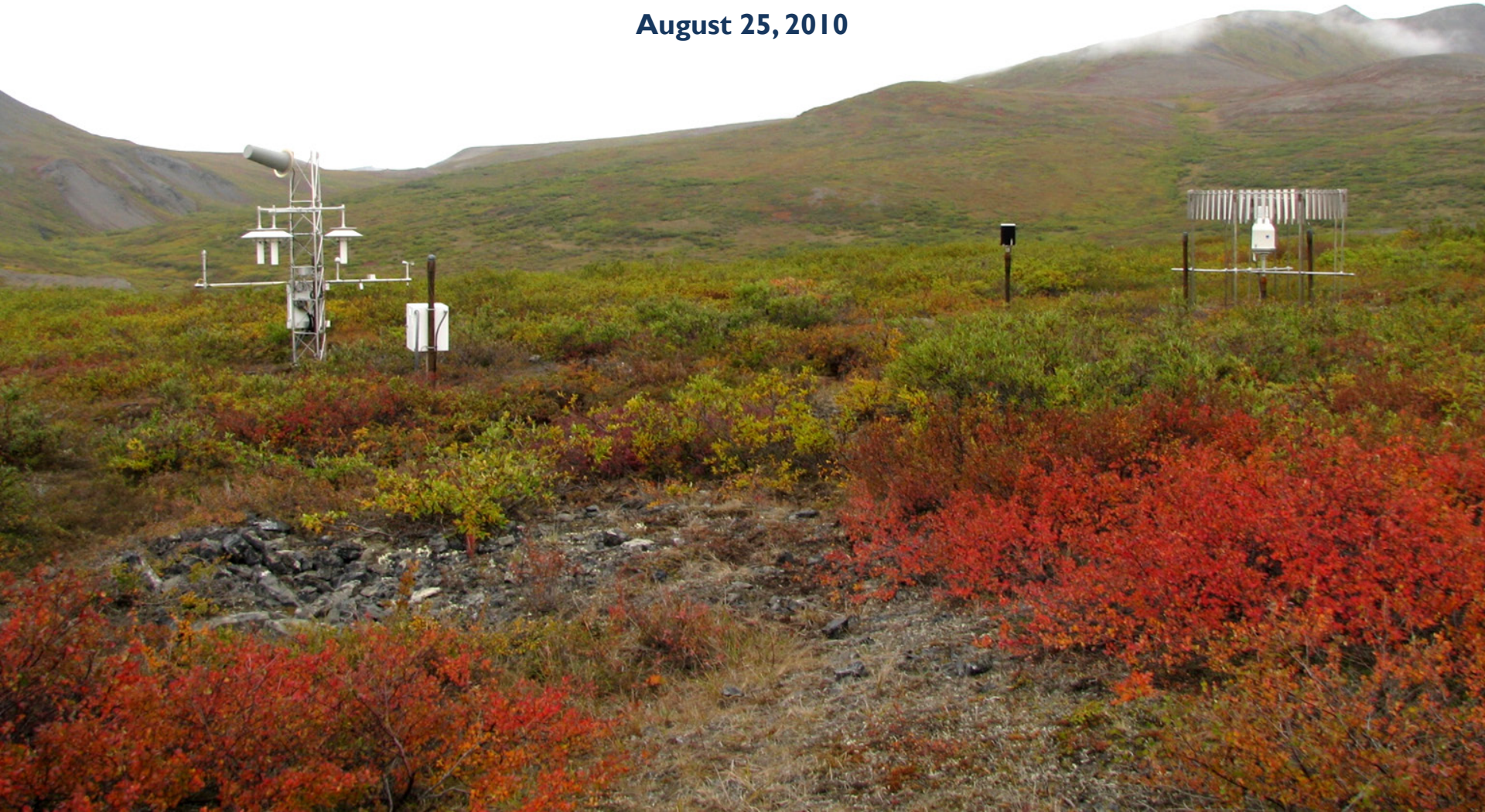
AK Port Alsworth 1 SW



US Climate Reference Network

AK Red Dog Mine 3 SSW

NANA Regional Corp Red Dog Mine
68.0 N 162.9 W 942'
August 25, 2010



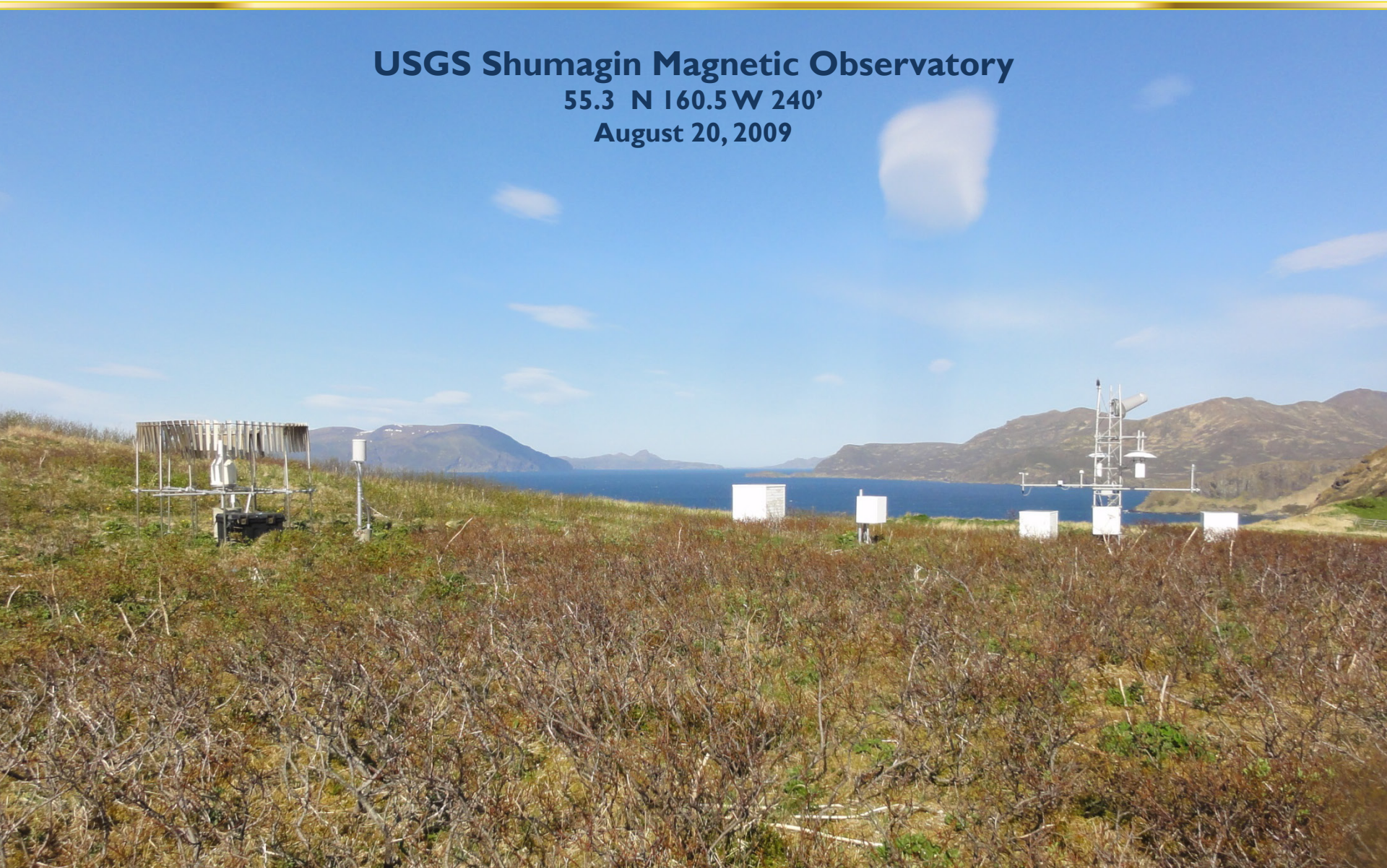
US Climate Reference Network

AK Ruby 44 ESE



US Climate Reference Network

AK Sand Point 1ENE



US Climate Reference Network

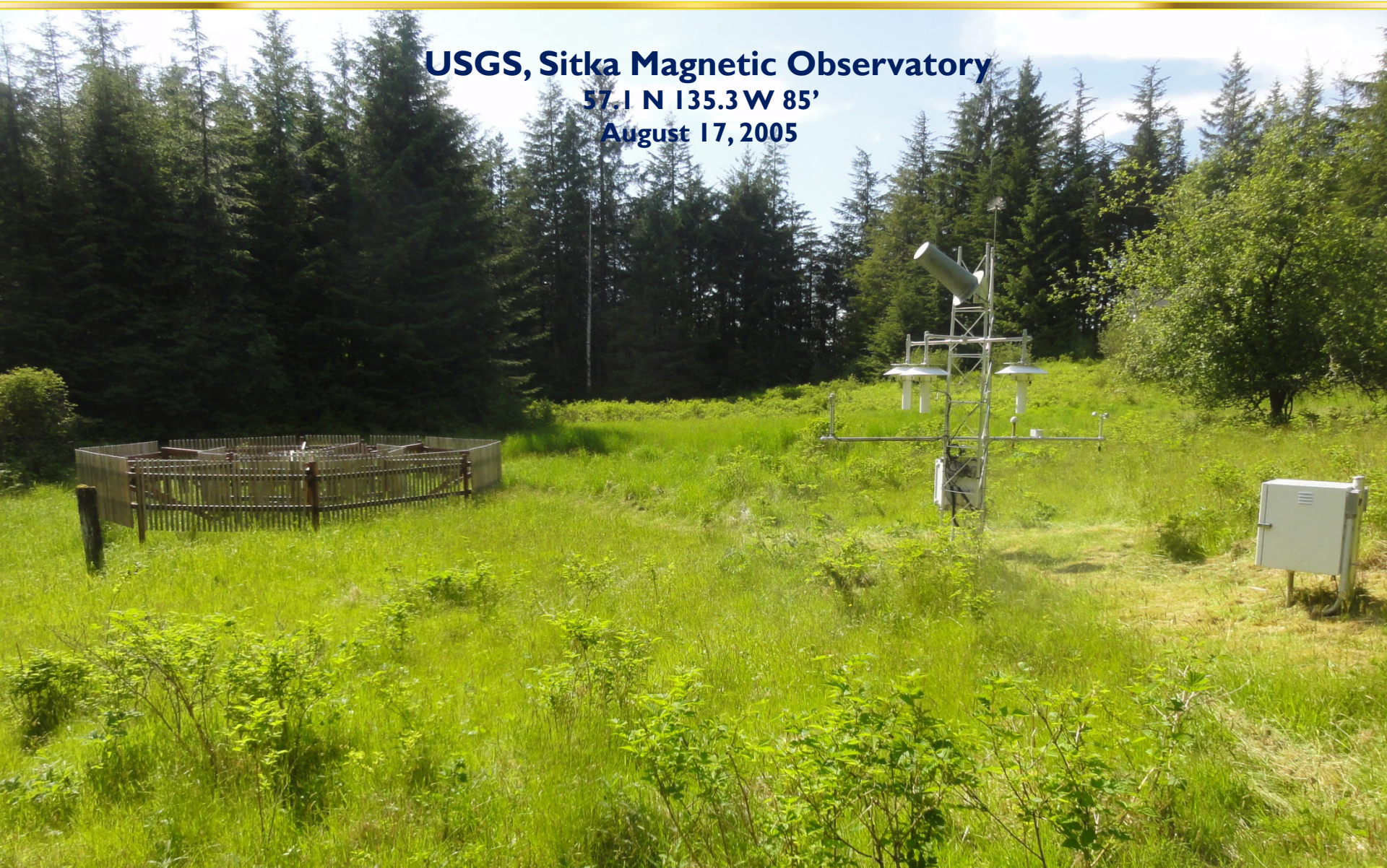
AK Selawik 28 E



FWS, Selawik National Wildlife Refuge (Cabin Site)
66.6 N 159.0 W 22'
Aug 14 2015

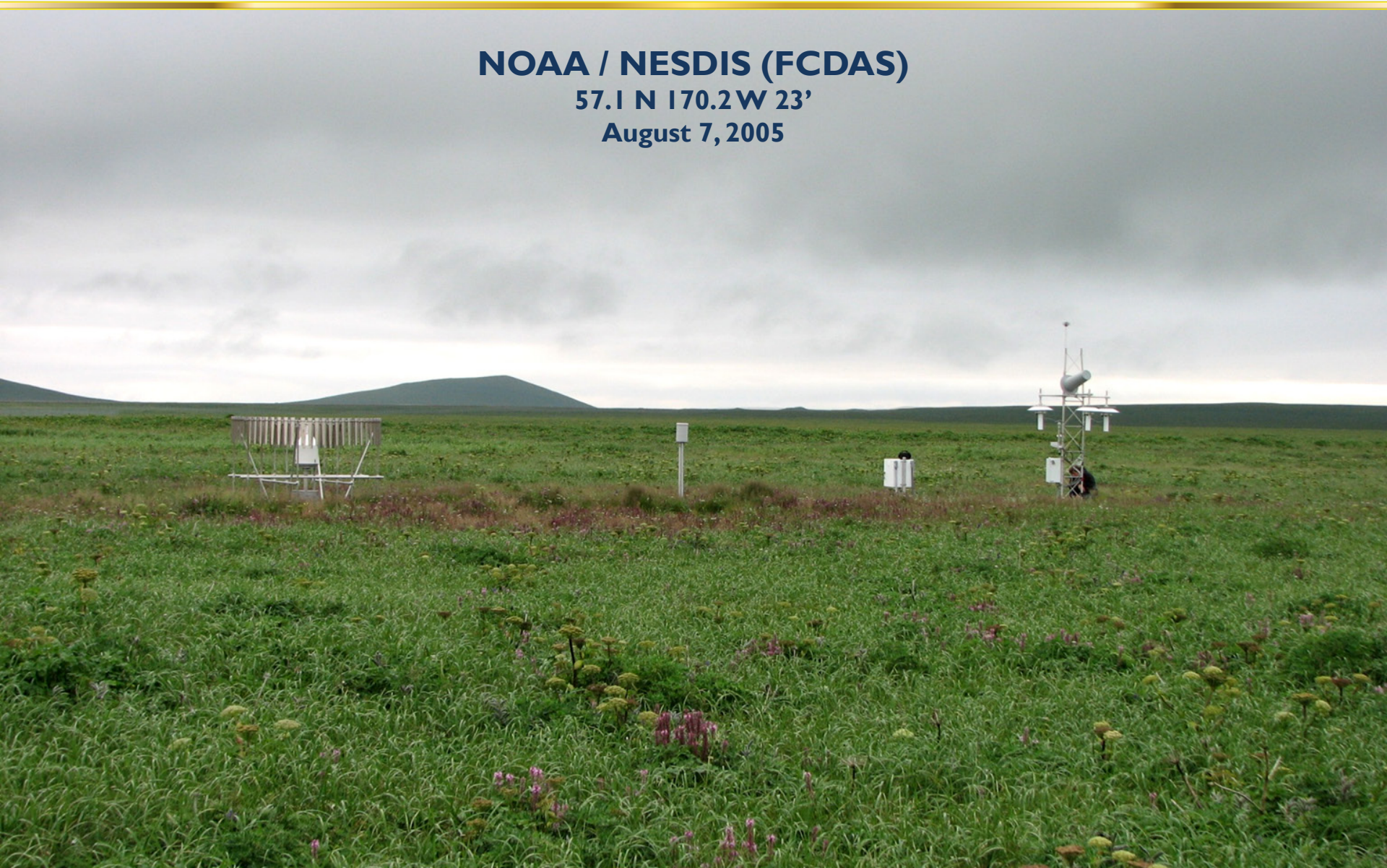
US Climate Reference Network

AK Sitka 1 NE



US Climate Reference Network

AK St Paul 4 NE



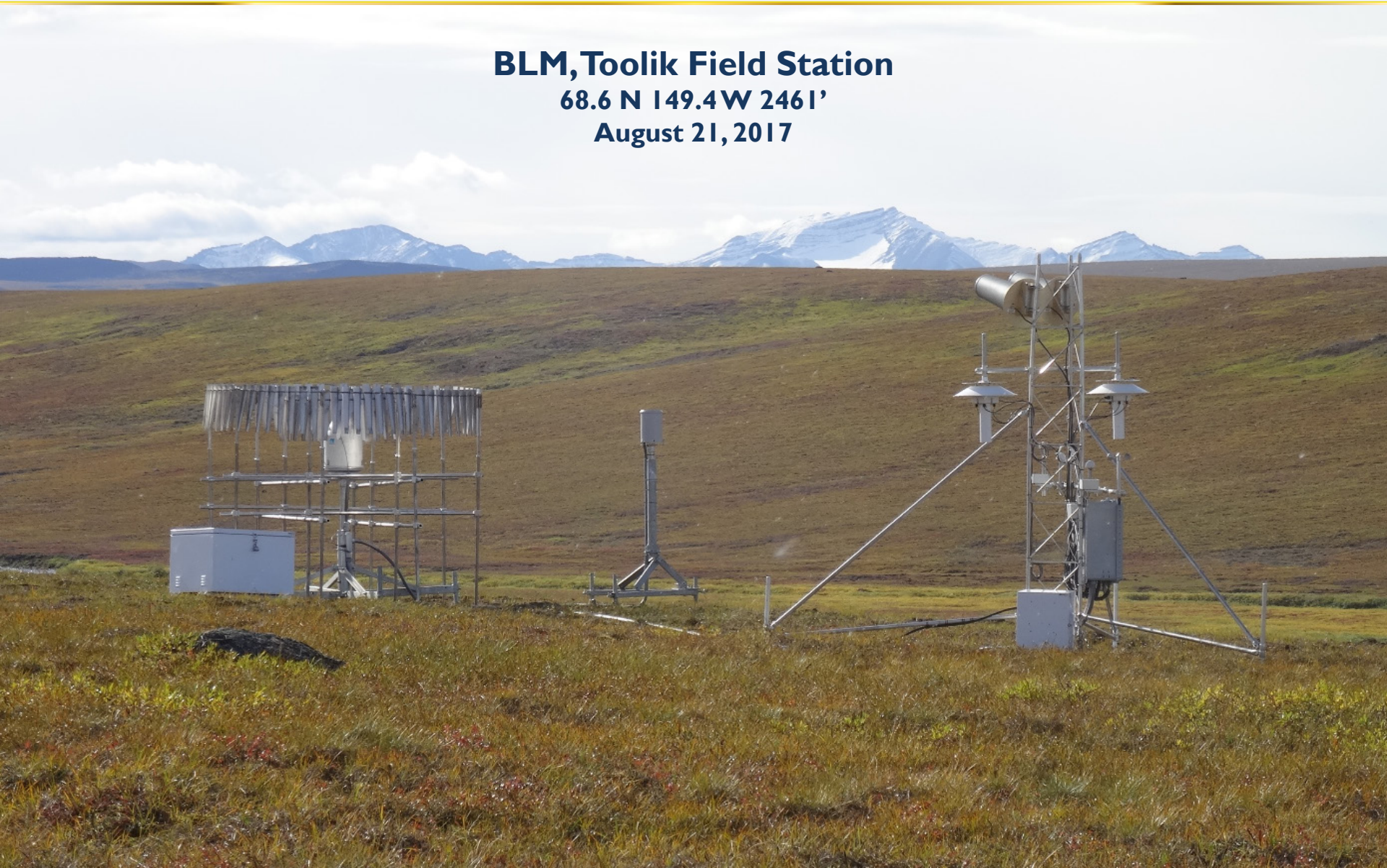
US Climate Reference Network

AK Tok 70 SE



US Climate Reference Network

AK Toolik Lake 5 ENE



US Climate Reference Network

AK Utqiaġvik 4 ENE (formerly Barrow)



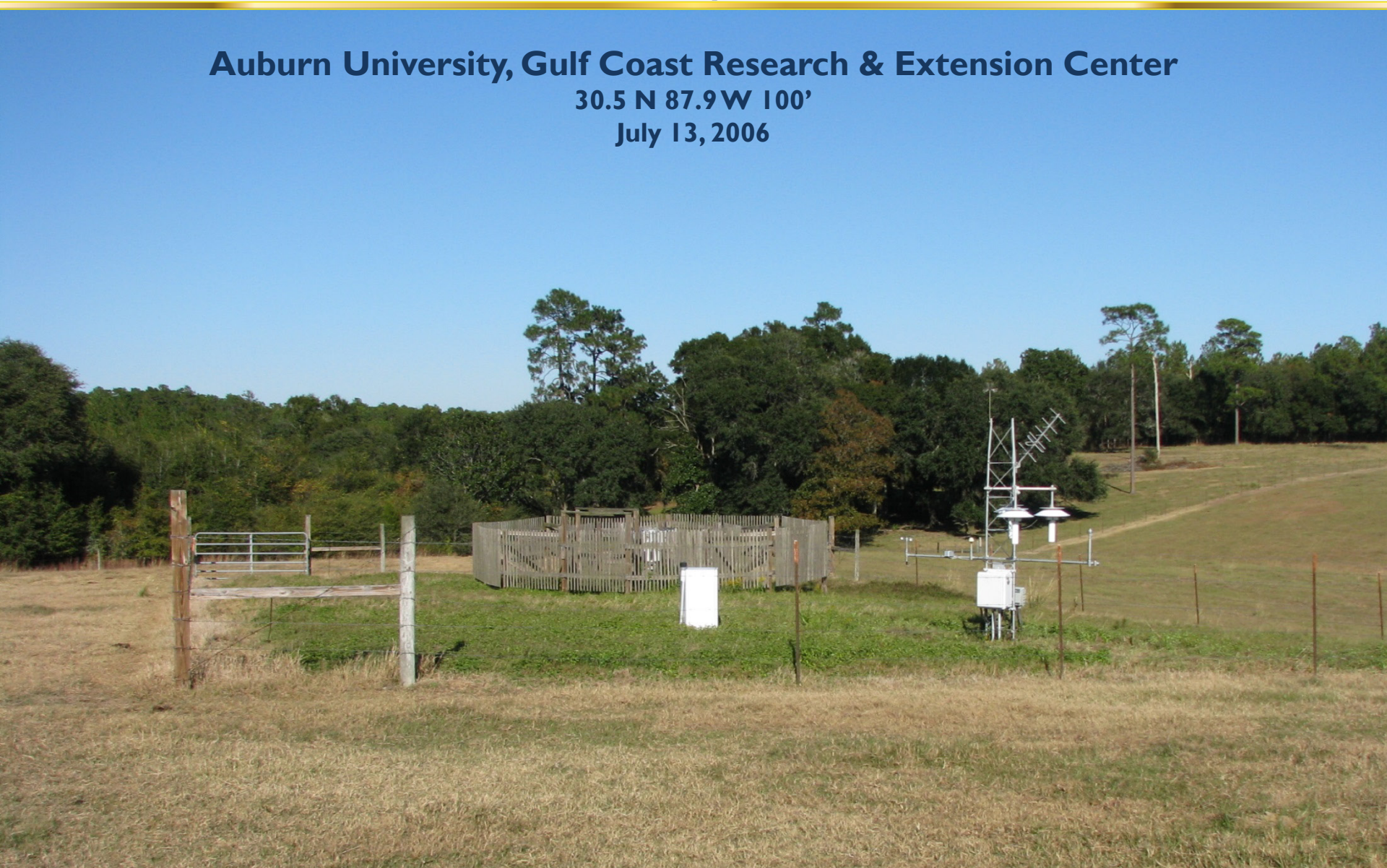
US Climate Reference Network

AK Yakutat 3 SSE



US Climate Reference Network

AL Fairhope 3 NE



US Climate Reference Network

AL Gadsden 19 N



US Climate Reference Network

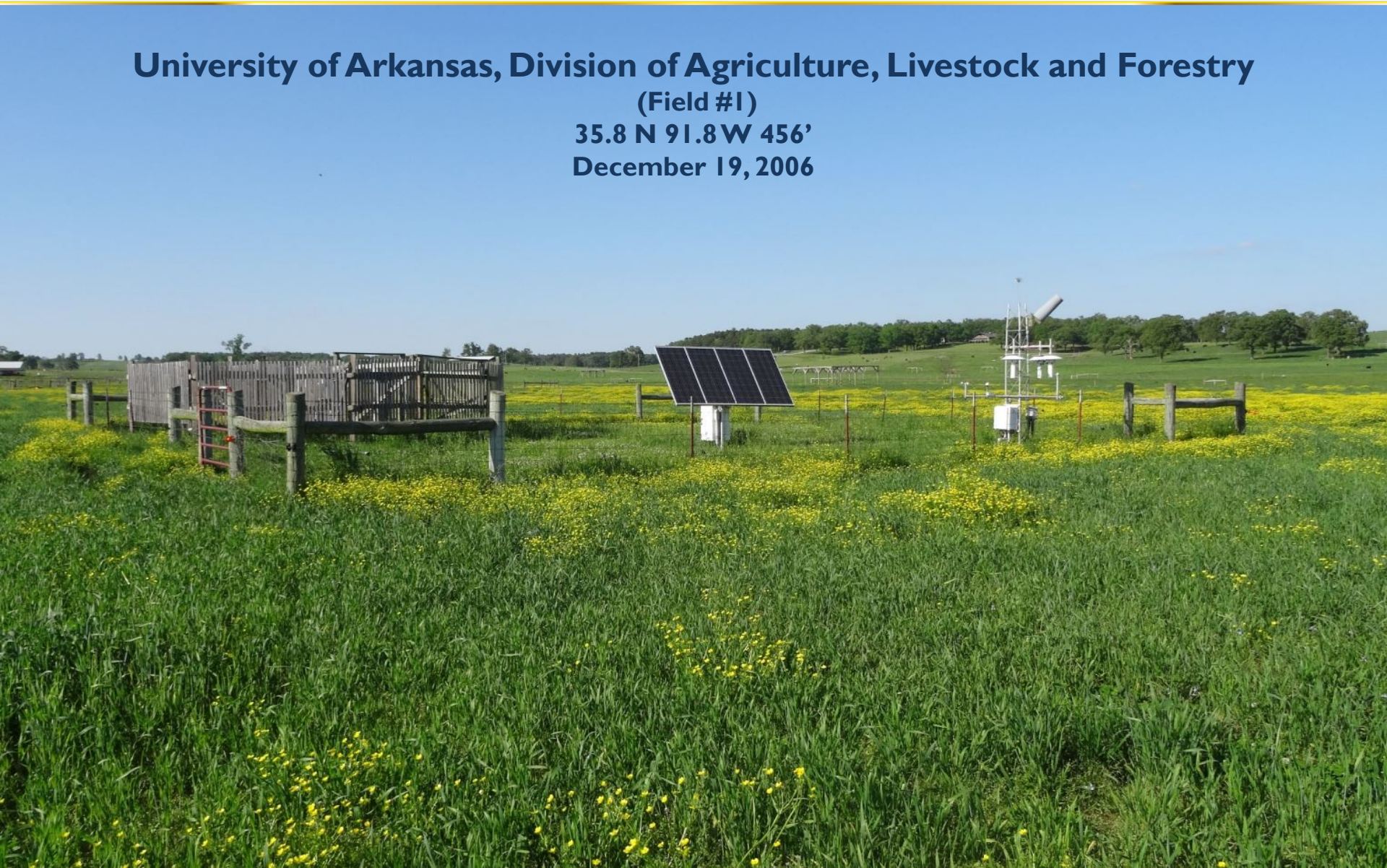
AL Selma 13 WNW

Auburn University (Black Belt Research and Extension Center)
32.5 N 87.2 W 204'
May 26, 2005



US Climate Reference Network

AR Batesville 8 WNW



US Climate Reference Network

AZ Elgin 5 S



US Climate Reference Network

AZ Tucson 11 W



US Climate Reference Network

AZ Williams 35 NNW



US Climate Reference Network

AZ Yuma 27 ENE



US Climate Reference Network

CA Bodega 6 WSW



US Climate Reference Network

CA Fallbrook 5 NE



US Climate Reference Network

CA Merced 23 WSW



Kesterson Reservoir, (U.S. Bureau of Reclamation)
37.2 N 120.9 W 64'
March 25, 2004

US Climate Reference Network

CA Redding 12 WNW



Whiskeytown National Recreation Area (RAWS Site)

40.7 N 122.6 W 1412'

March 25, 2003

US Climate Reference Network

CA Santa Barbara 11 W



US Climate Reference Network

CA Stovepipe Wells 1 SW



US Climate Reference Network

CA Yosemite Village 12 W



US Climate Reference Network

CO Boulder 14 W



US Climate Reference Network

CO Cortez 8 SE



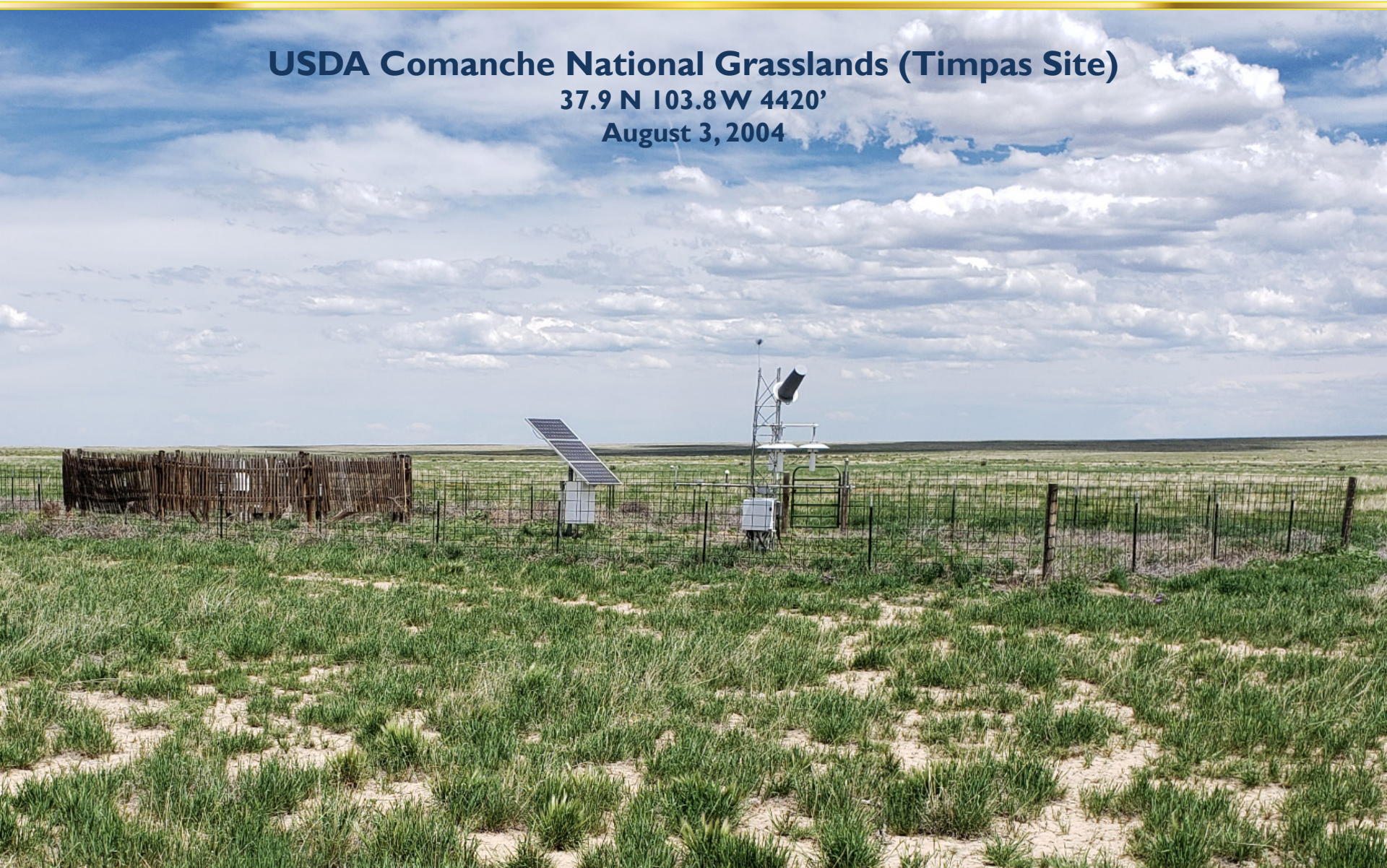
US Climate Reference Network

CO Dinosaur 2 E



US Climate Reference Network

CO La Junta 17 WSW



US Climate Reference Network

CO Montrose 11 ENE



US Climate Reference Network

CO Nunn 7 NNE



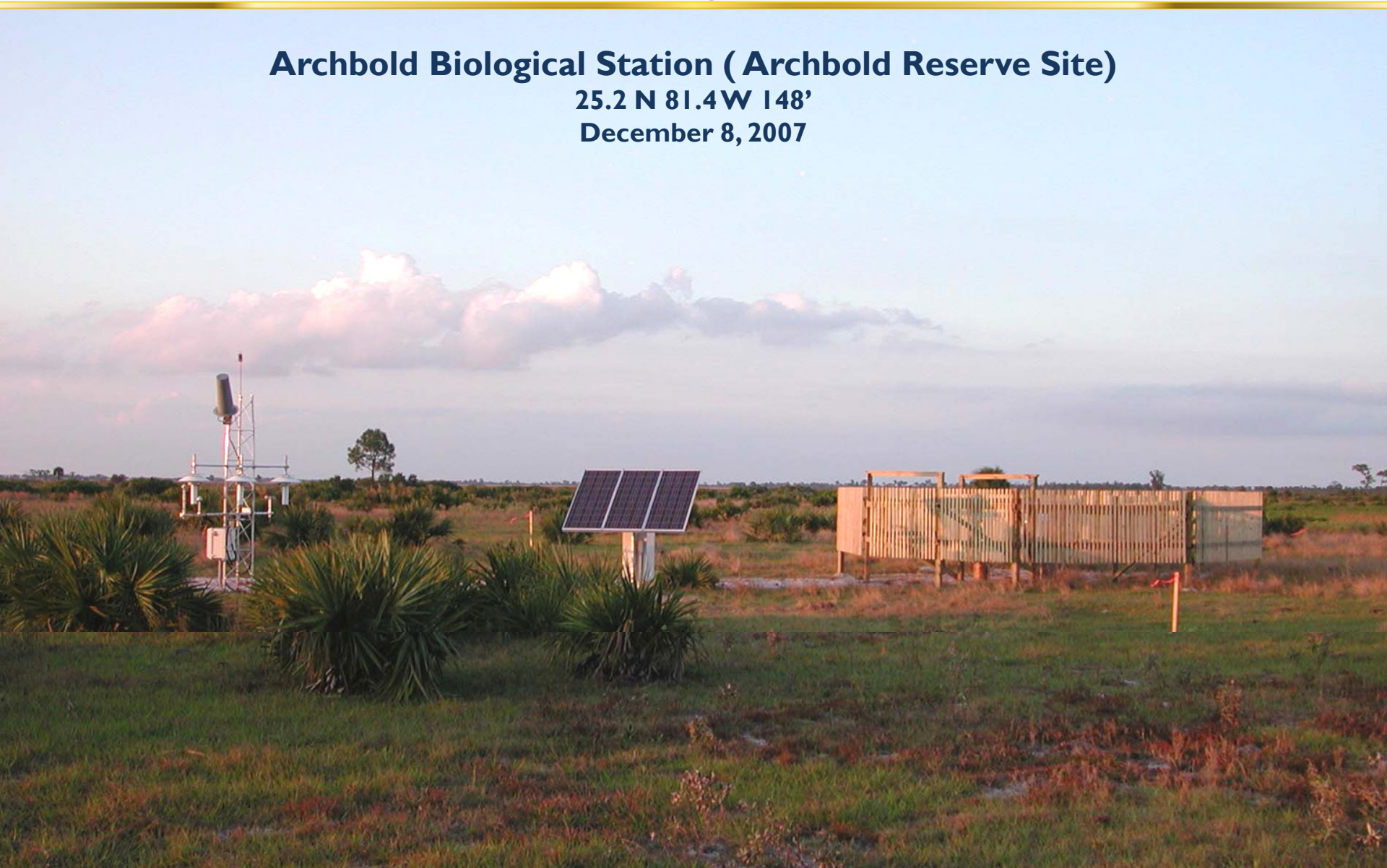
US Climate Reference Network

FL Everglades City 5 NE



US Climate Reference Network

FL Sebring 23 SSE



Archbold Biological Station (Archbold Reserve Site)

25.2 N 81.4W 148'

December 8, 2007

US Climate Reference Network

FL Titusville 7 E



US Climate Reference Network

GA Brunswick 23 S



US Climate Reference Network

GA Newton 8 W



US Climate Reference Network

GA Newton 11 SW



US Climate Reference Network

GA Watkinsville 5 SSE



US Climate Reference Network

Experimental

HI Hilo 5 S

University of Hawaii (Waiakea Experiment Station)

19.6N 155.1W 730'

September 26, 2005



US Climate Reference Network

Experimental

HI Mauna Loa 5 NNE



US Climate Reference Network

IA Des Moines 17 E



Neal Smith National Wildlife Reserve (NOAA Station Site)

41.6 N 93.3 W 938'

September 16, 2004

US Climate Reference Network

ID Arco 17 SW



US Climate Reference Network

ID Murphy 10 W



US Climate Reference Network

IL Champaign 9 SW



University of Illinois (Bondville Environmental & Atmospheric Research Station)

40.1 N 88.4 W 690'

December 20, 2002

US Climate Reference Network

IL Shabonna 5 NNE



Northern Illinois Agronomy Research Center
41.8 N 88.9W 892'
August 16, 2003

US Climate Reference Network

IN Bedford 5 WNW



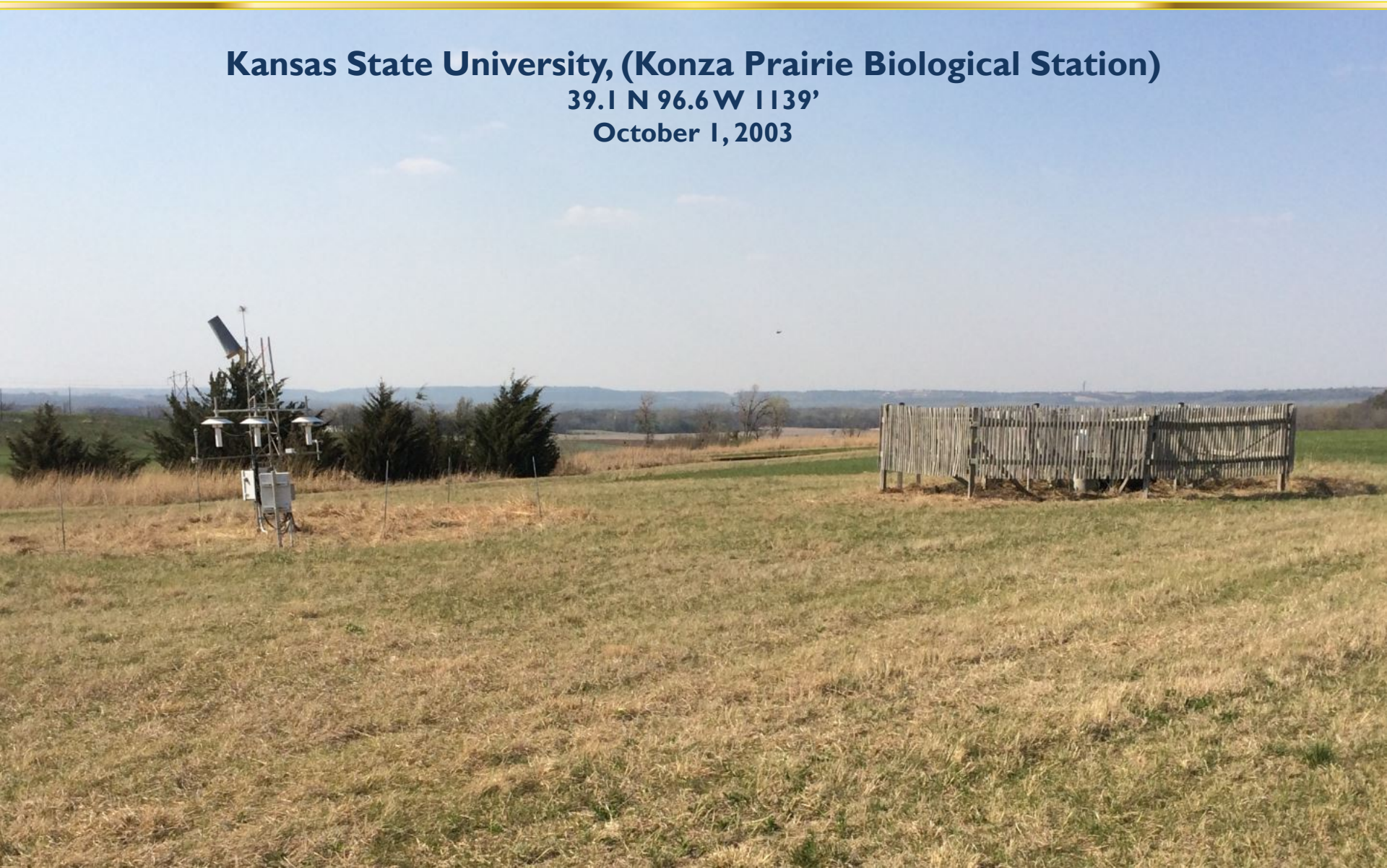
Feldun-Purdue Agricultural Center (Pasture 17 Site)

38.9 N 86.6 W 747'

October 3, 2007

US Climate Reference Network

KS Manhattan 6 SSW



US Climate Reference Network

KS Oakley 19 SSW



US Climate Reference Network

KY Bowling Green 21 NNE



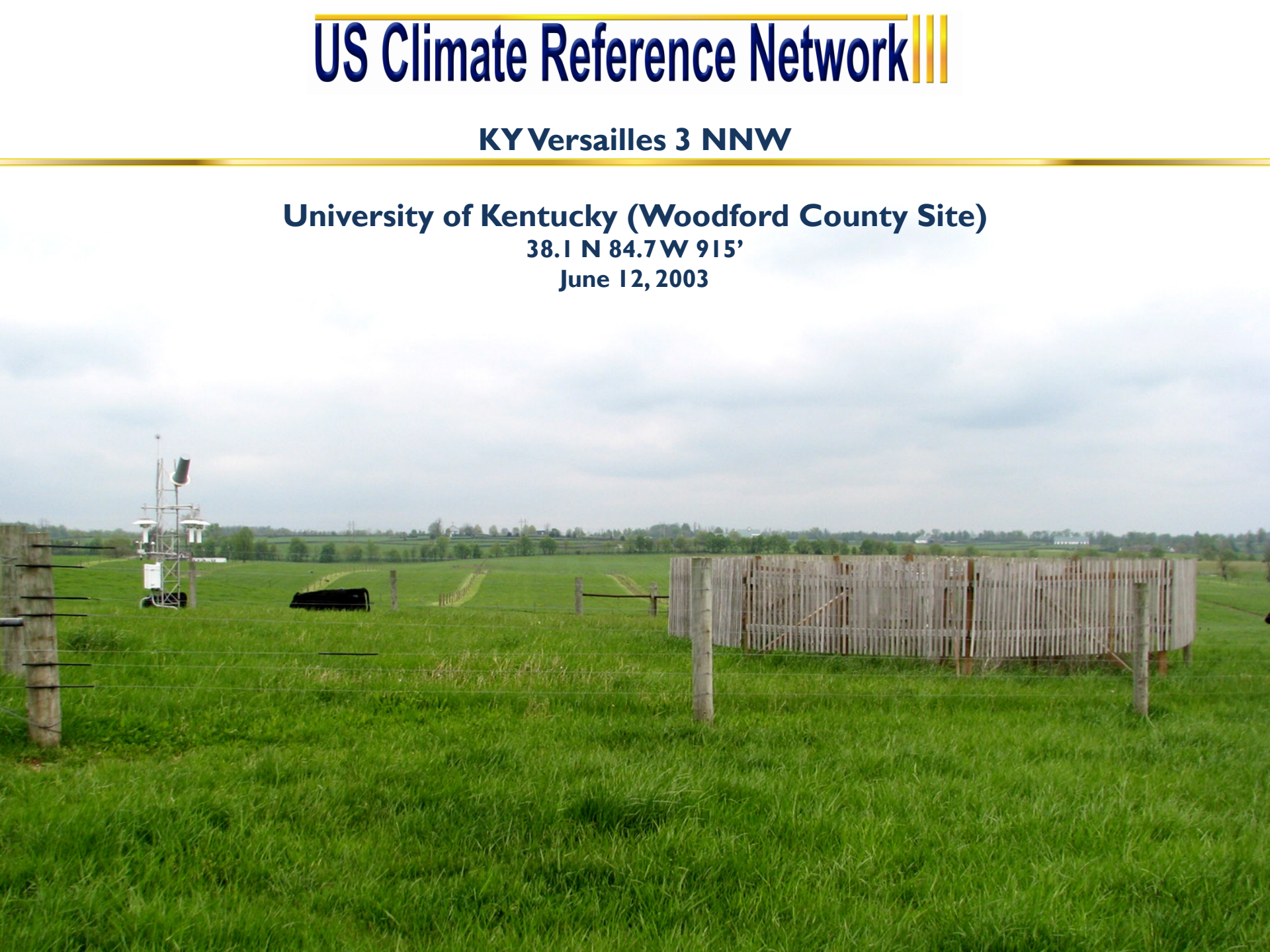
US Climate Reference Network

KY Versailles 3 NNW

University of Kentucky (Woodford County Site)

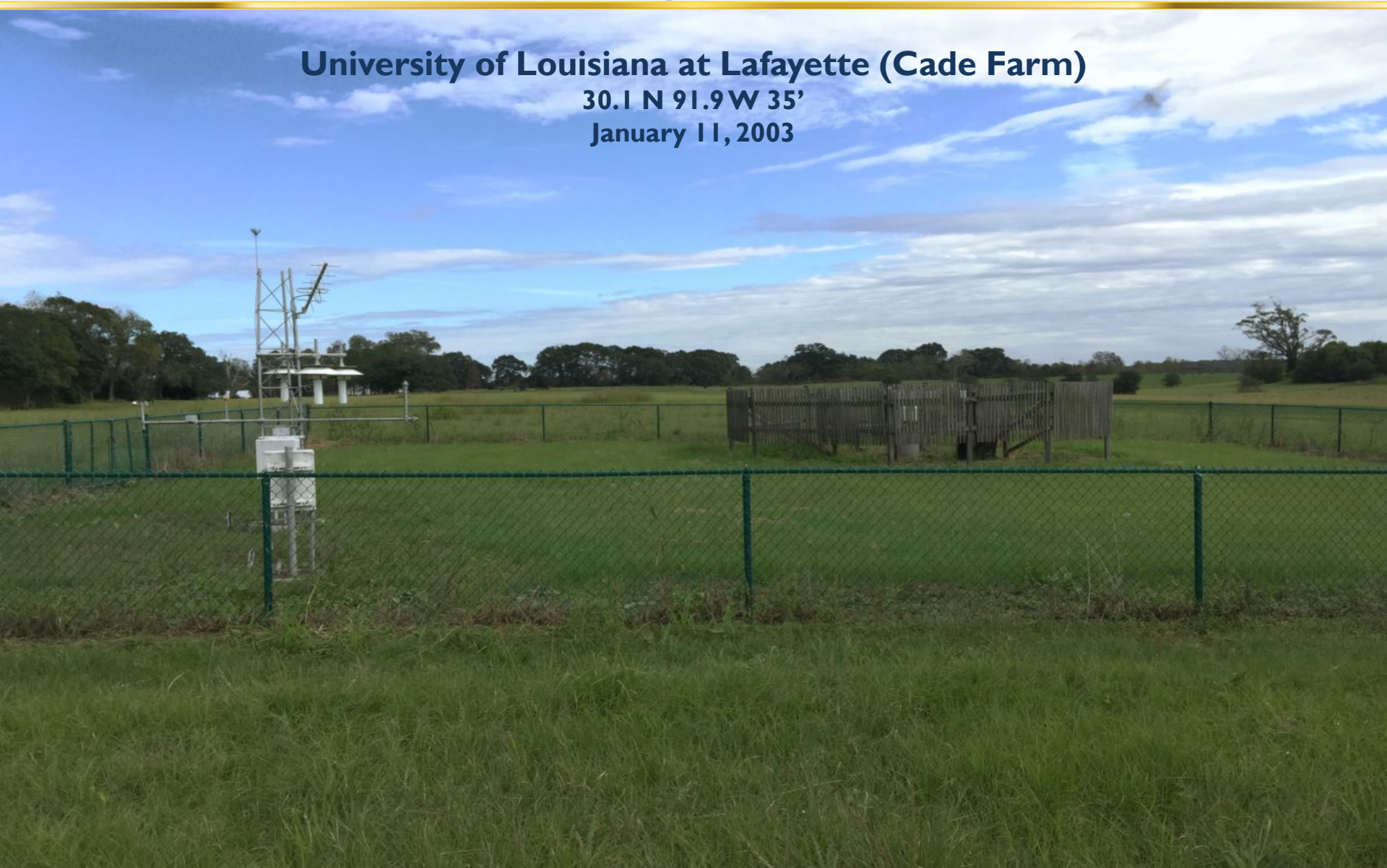
38.1 N 84.7 W 915'

June 12, 2003



US Climate Reference Network

LA Lafayette 13 SE



US Climate Reference Network

LA Monroe 26 N



US Climate Reference Network

ME Limestone 4 NNW



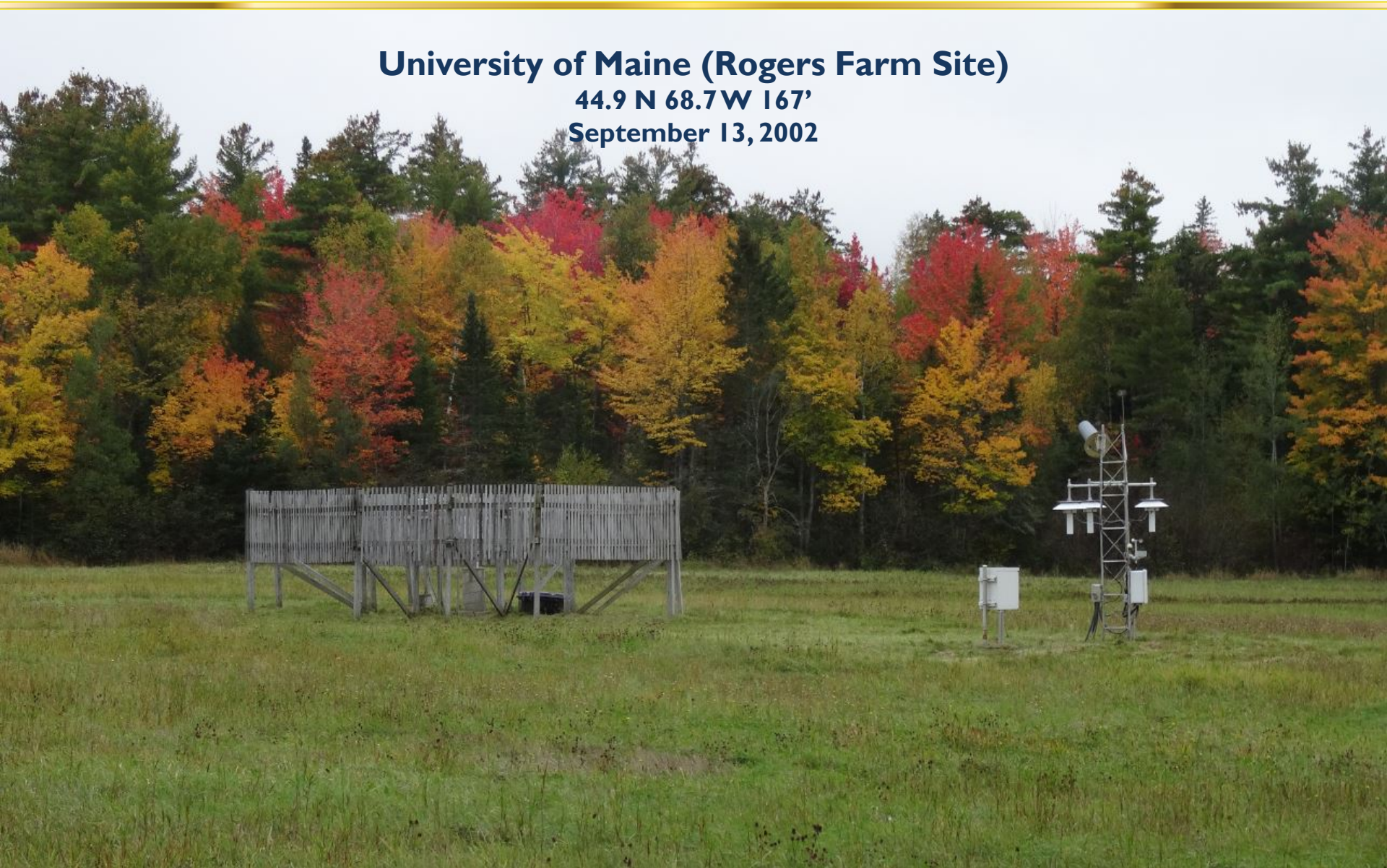
Aroostook National Wildlife Refuge (Fire Training Area)

47.0 N 67.9 W 775'

September 24, 2002

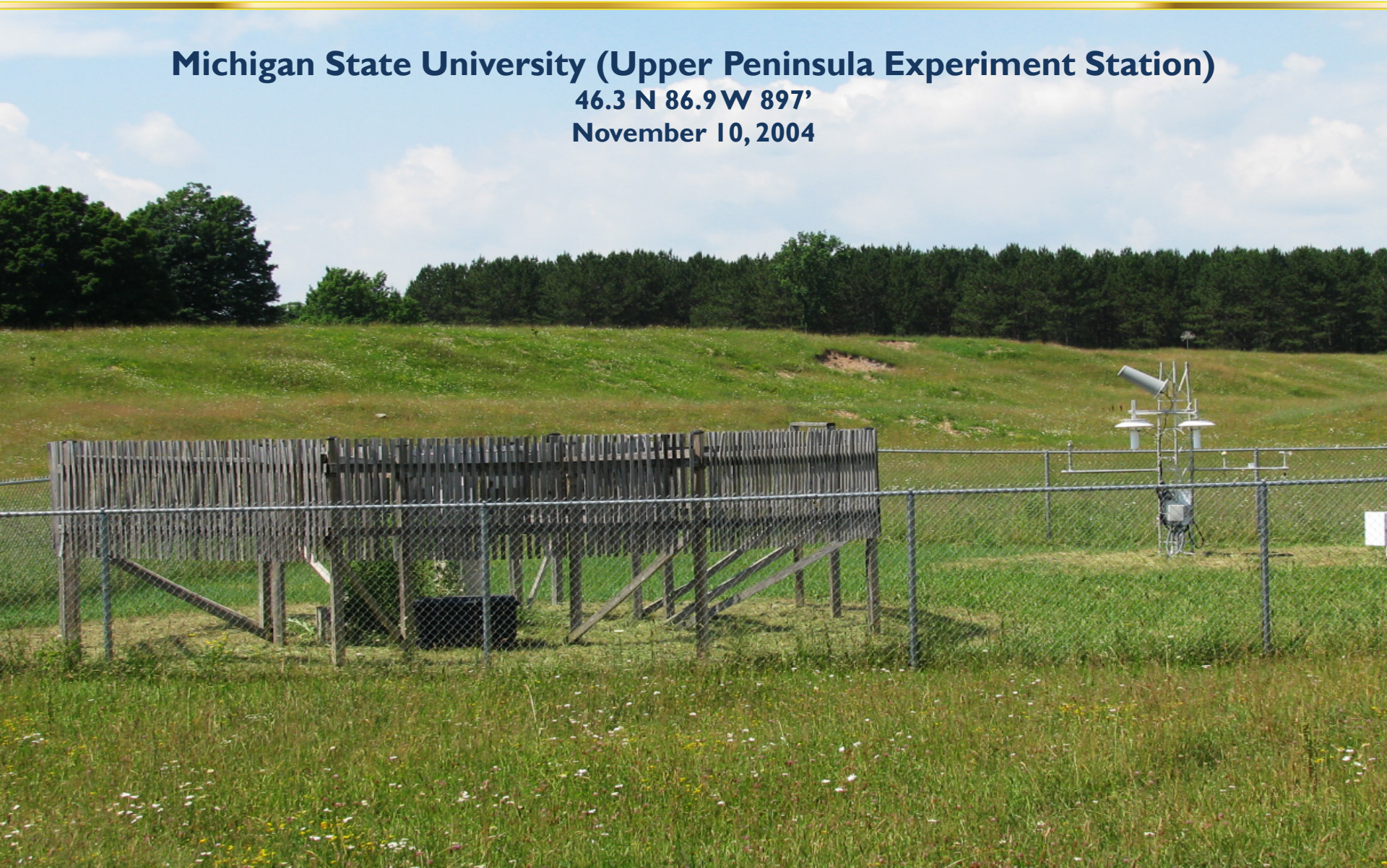
US Climate Reference Network

ME Old Town 2 W



US Climate Reference Network

MI Chatham 1 SE



Michigan State University (Upper Peninsula Experiment Station)
46.3 N 86.9 W 897'
November 10, 2004

US Climate Reference Network

MI Gaylord 9 SSW



US Climate Reference Network

MN Goodridge 12 NNW



US Climate Reference Network

MN Sandstone 6 W



US Climate Reference Network

MO Chillicothe 22 ENE



University of Missouri (Forage Systems Research Station)
39.9 N 93.1 W 850'
June 11, 2005

US Climate Reference Network

MO Joplin 24 N



US Climate Reference Network

MO Salem 10 W



US Climate Reference Network

MS Holly Springs 4 N



US Climate Reference Network

MS Newton 5 ENE



US Climate Reference Network

MT Dillon 18 WSW



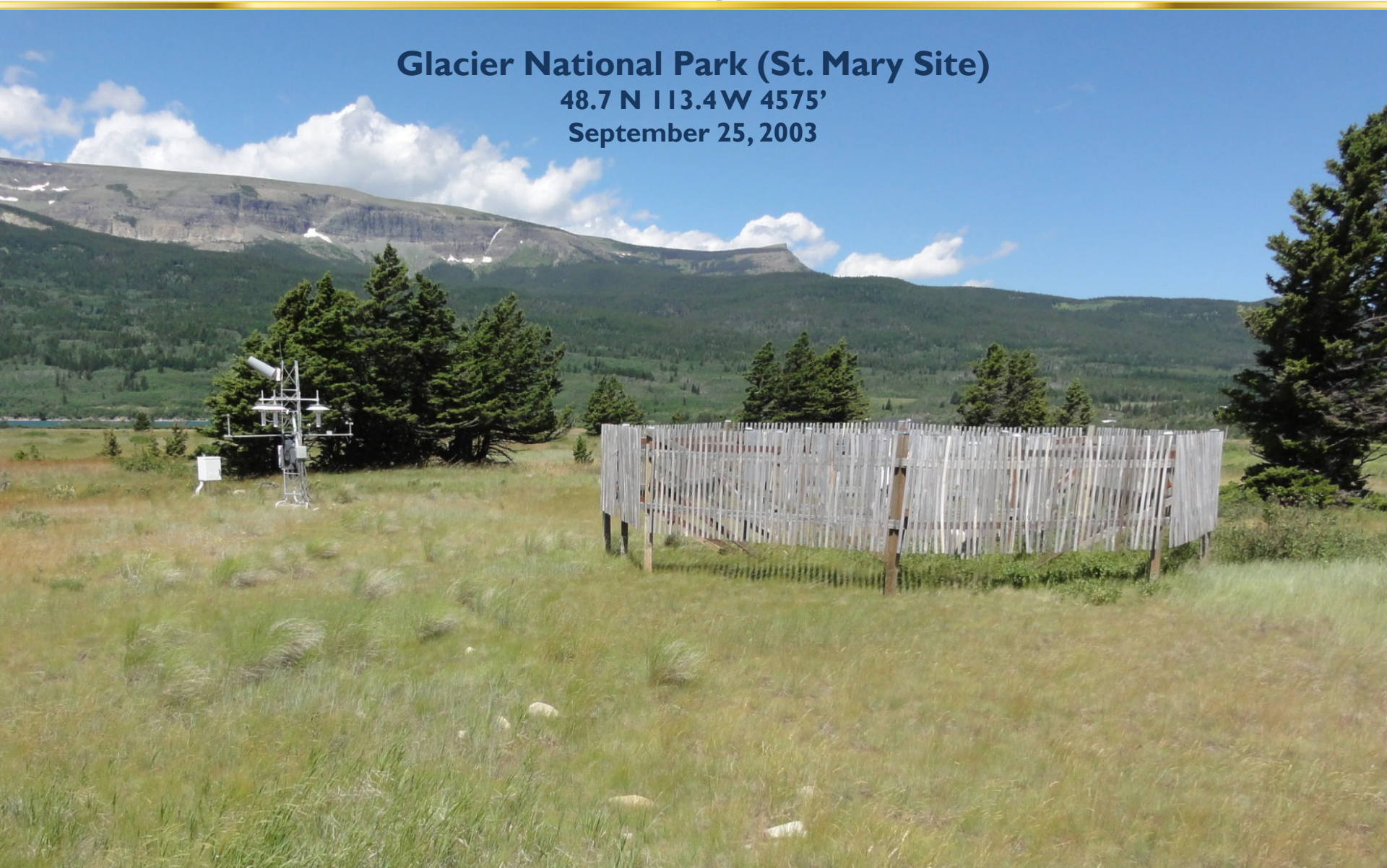
US Climate Reference Network

MT Lewistown 42 WSW



US Climate Reference Network

MT St. Mary 1 SSW



US Climate Reference Network

MT Wolf Point 29 ENE

Fort Peck Indian Reservation (Poplar River Site)

48.3 N 105.1 W 2079'

December 20, 2001



US Climate Reference Network

MT Wolf Point 34 NE



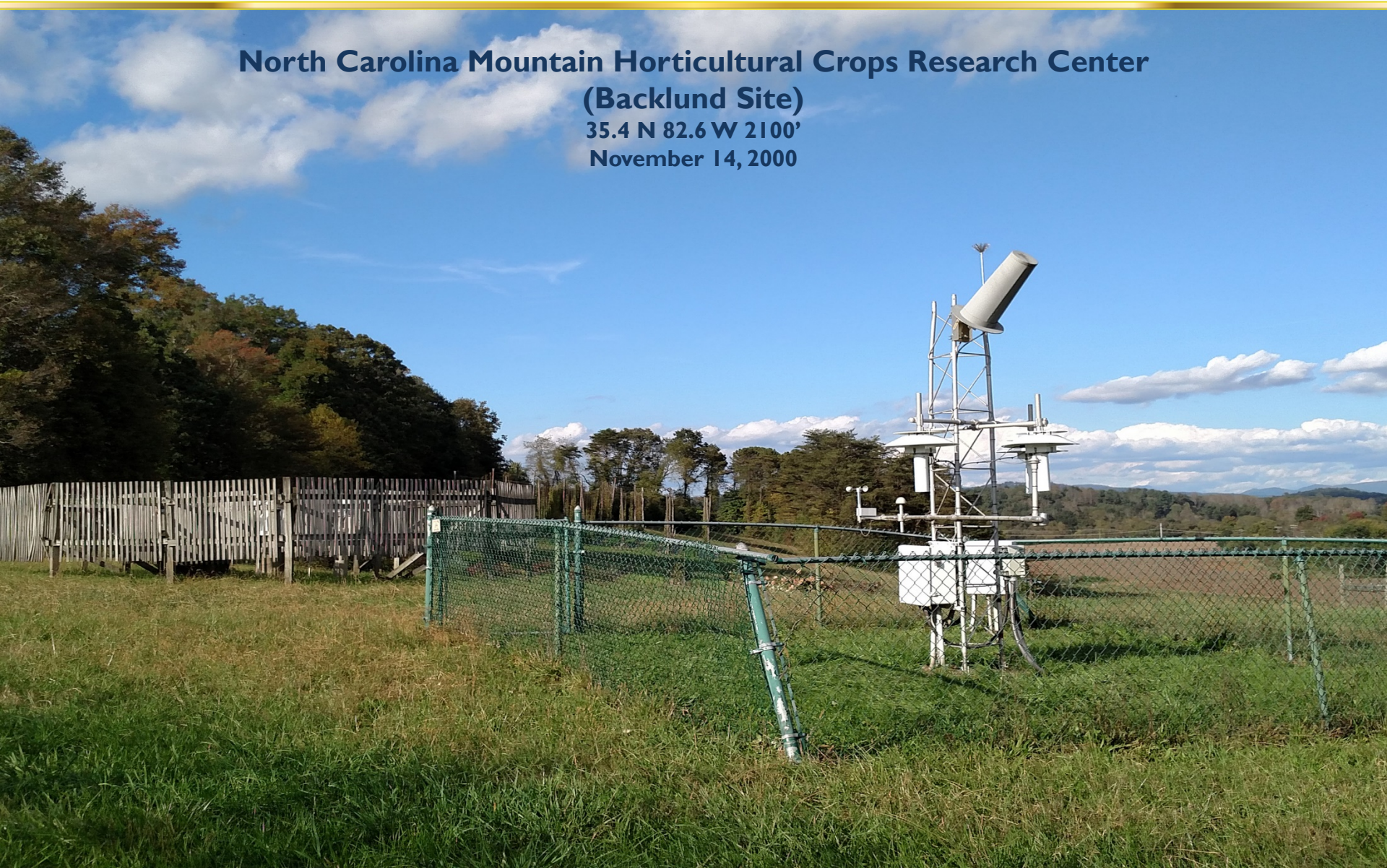
US Climate Reference Network

NC Asheville 8 SSW



US Climate Reference Network

NC Asheville 13 S



US Climate Reference Network

NC Durham 11 W



US Climate Reference Network

ND Jamestown 38 WSW



US Climate Reference Network

ND Medora 7 E

Theodore Roosevelt National Park (Painted Canyon Site)

46.9 N 103.4 W 2805'

September 19, 2004



US Climate Reference Network

ND Northgate 5 ESE



US Climate Reference Network

NE Harrison 20 SSE



US Climate Reference Network

NE Lincoln 8 ENE



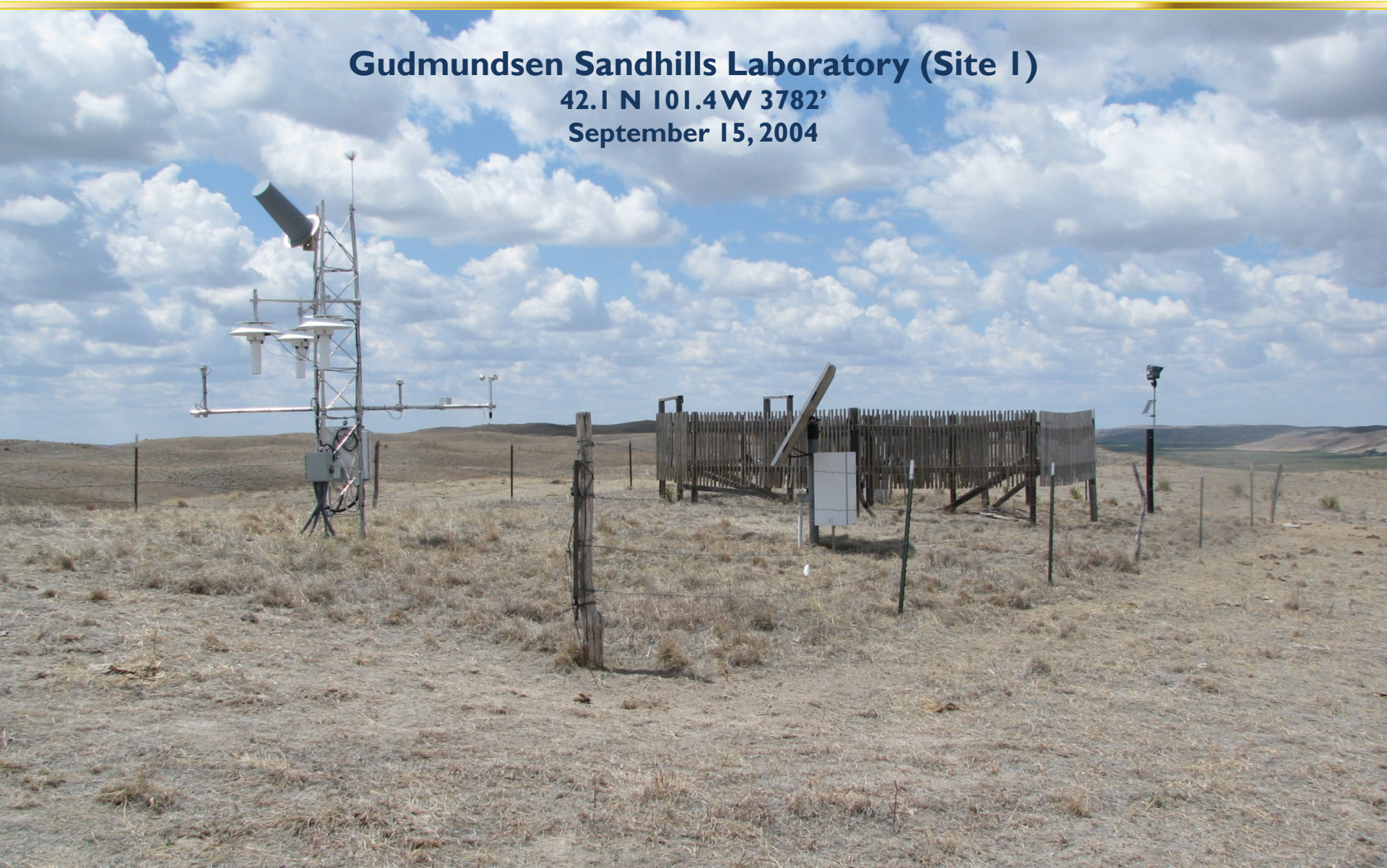
US Climate Reference Network

NE Lincoln 11 SW



US Climate Reference Network

NE Whitman 5 ENE



US Climate Reference Network

NH Durham 2 N



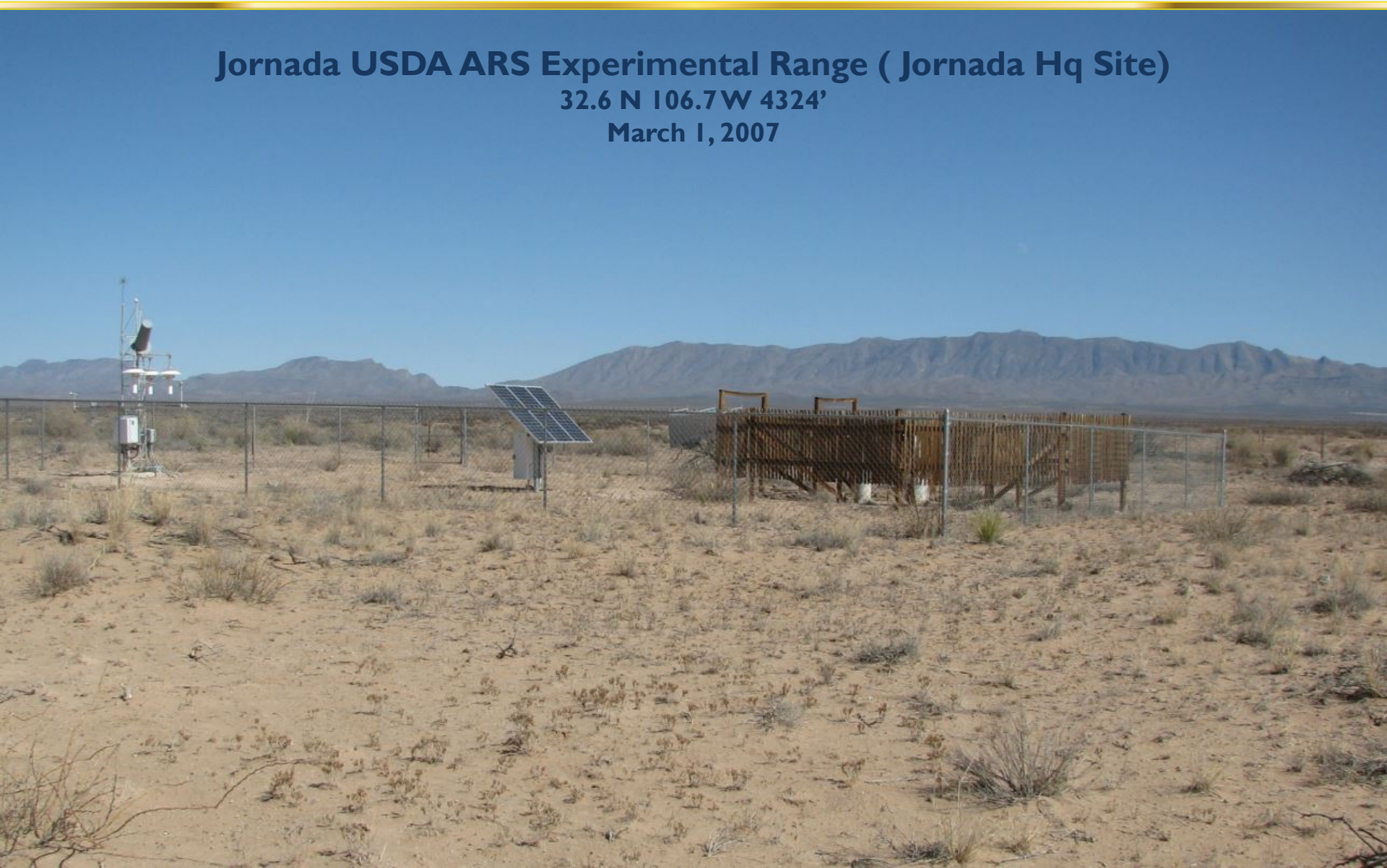
US Climate Reference Network

NH Durham 2 SSW



US Climate Reference Network

NM Las Cruces 20 N



US Climate Reference Network

NM Los Alamos 13 W

NPS, Valles Caldera National Preserve
35.9 N 106.5 W 8705'
July 31, 2004



US Climate Reference Network

NM Socorro 20 N



US Climate Reference Network

NV Baker 5 W



Great Basin National Park (Gravel Pit Site)
39.0 N 114.2 W 6594'
May 9, 2004

US Climate Reference Network

NV Denio 52 WSW



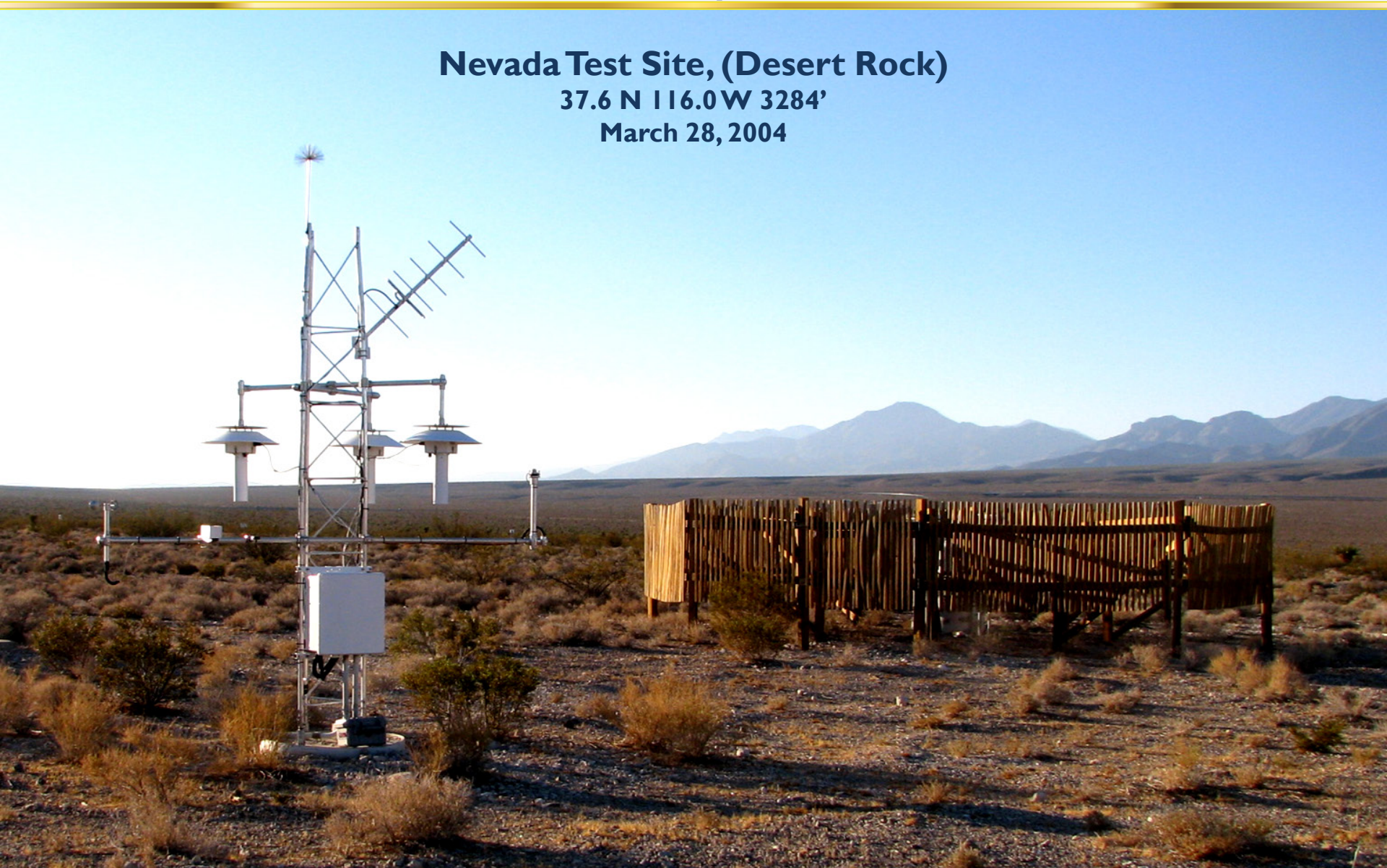
Sheldon National Wildlife Refuge (Little Sheldon Site)

41.8 N 119.6 W 6501'

June 16, 2008

US Climate Reference Network

NV Mercury 3 SSW



US Climate Reference Network

NY Ithaca 13 E

Cornell University (Harford Teaching & Research Center)

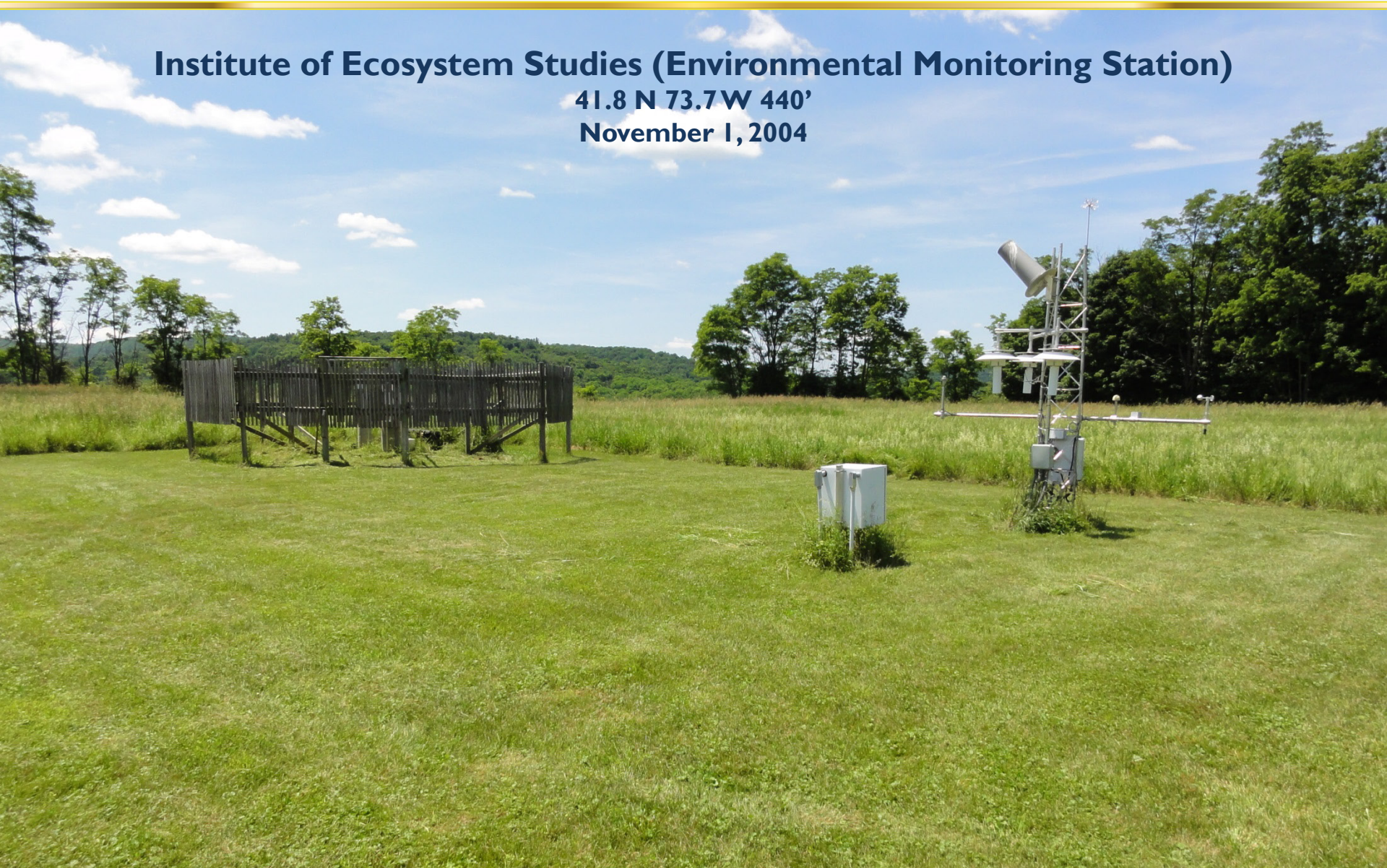
42.4 N 76.2 W 1248'

October 27, 2004



US Climate Reference Network

NY Millbrook 3 W



US Climate Reference Network

OH Wooster 3 SSE

OSU, Ohio Agricultural Research & Development Center (Snyder Farm Site)

N 40.8 N 81.9 W 1102'

November 11, 2016



US Climate Reference Network

OK Goodwell 2 E



Oklahoma Panhandle Research & Extension Center (Native Grassland Site)

36.6 N 101.6 W 3275'

February 27, 2004

US Climate Reference Network

Non-commissioned

OK Goodwell 2 SE



US Climate Reference Network

OK Stillwater 2 W

Oklahoma State University (Agricultural Research Farm Site)

36.1 N 97.1 W 910'

March 15, 2002



US Climate Reference Network

OK Stillwater 5 WNW



Oklahoma State University (Efaw Farm Site)
36.1 N 97.1 W 909'
March 15, 2002

US Climate Reference Network

OR Coos Bay 8 SW

South Slough National Estuarine Research Reserve (Frederickson Marsh Site)

43.3 N 124.3 W 20'

August 10, 2008



US Climate Reference Network

OR Corvallis 10 SSW



US Climate Reference Network

OR John Day 35 WNW

John Day Fossil Beds National Monument (Sheep Rock Headquarters)

44.6 N 119.6 W 2220'

March 20, 2004



US Climate Reference Network

OR Riley 10 WSW



US Climate Reference Network

PA Avondale 2 N



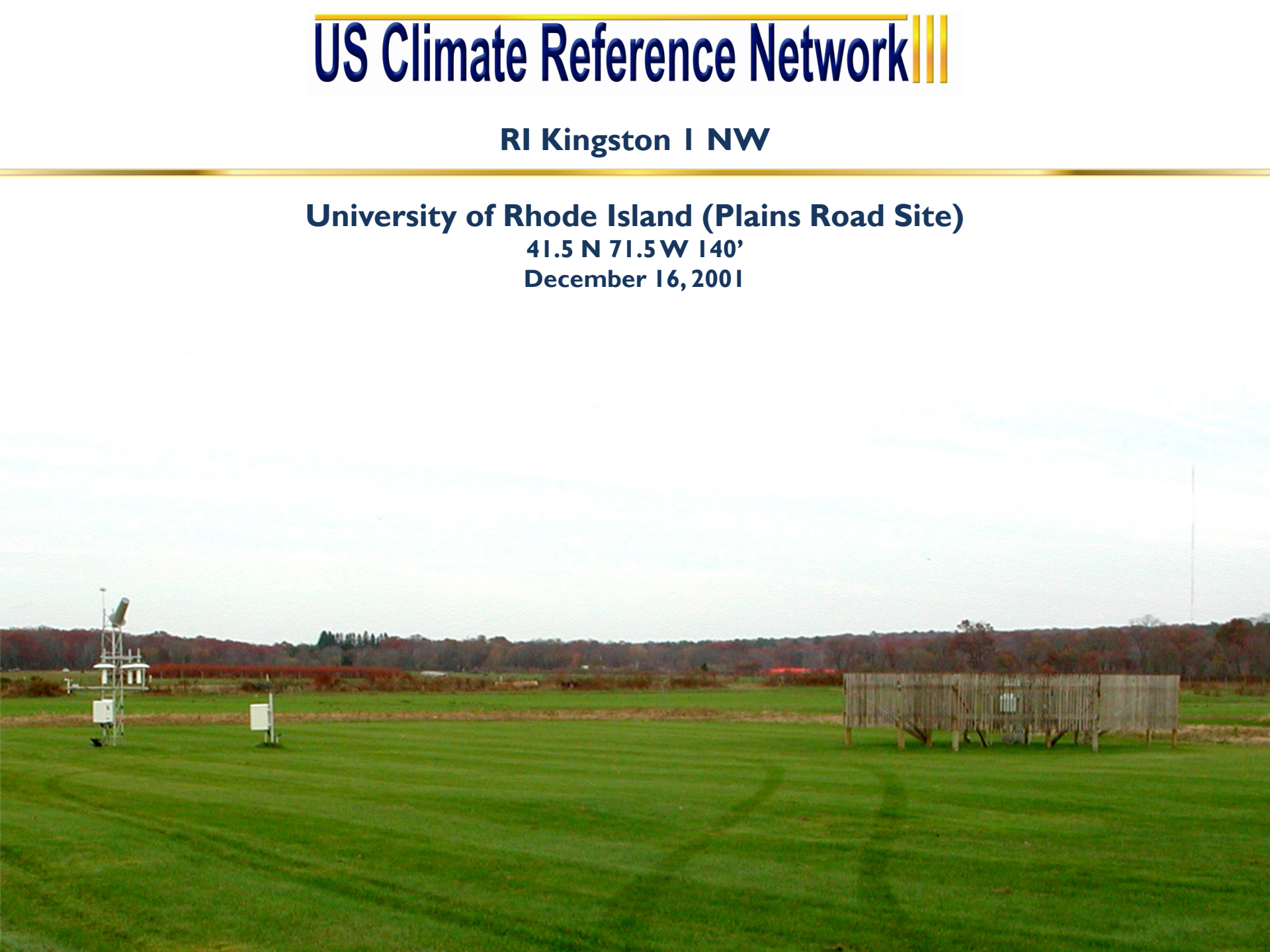
US Climate Reference Network

RI Kingston 1 NW

University of Rhode Island (Plains Road Site)

41.5 N 71.5 W 140'

December 16, 2001



US Climate Reference Network

RI Kingston 1 W



US Climate Reference Network

SC Blackville 3 W



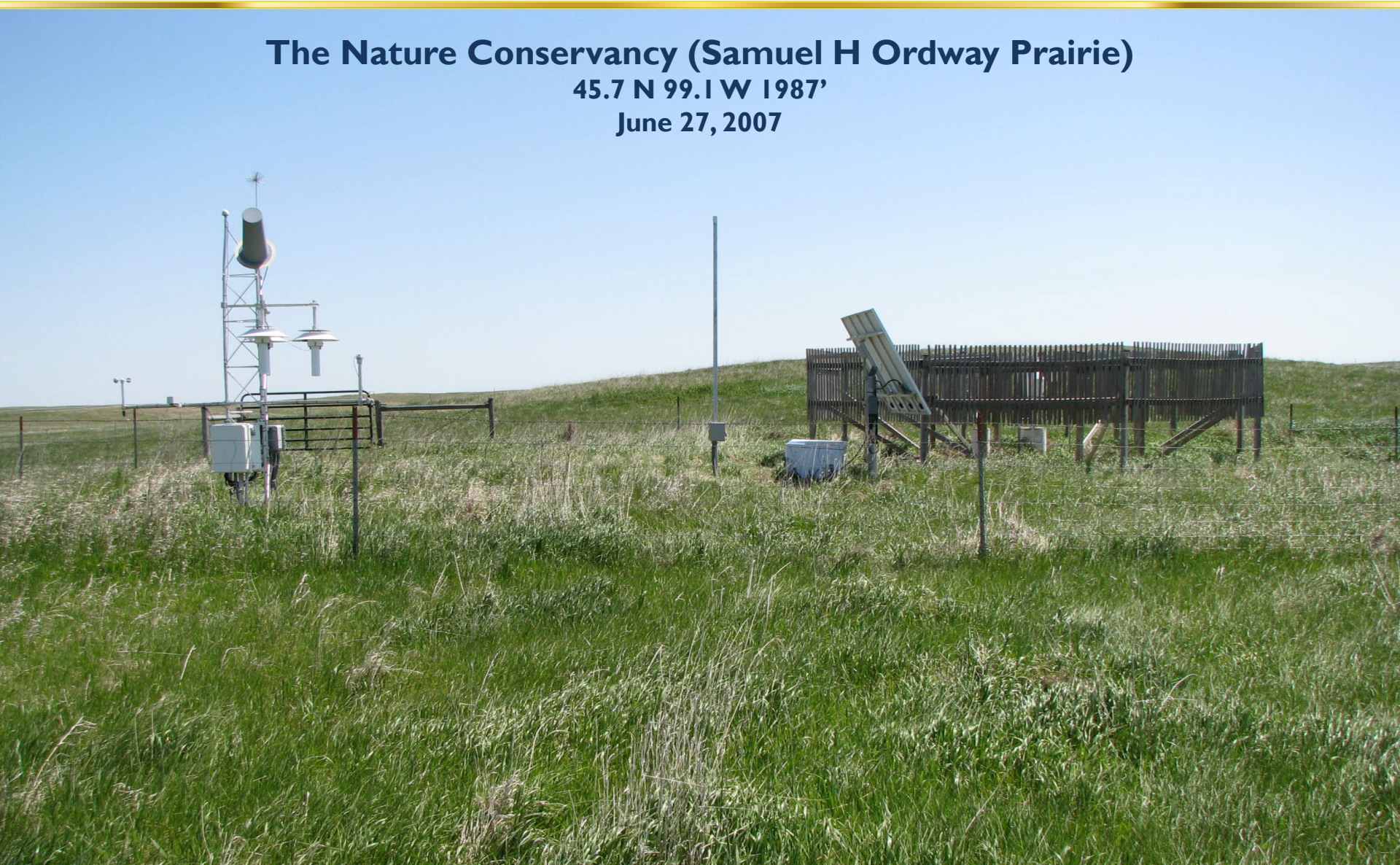
US Climate Reference Network

SC McClellanville 7 NE



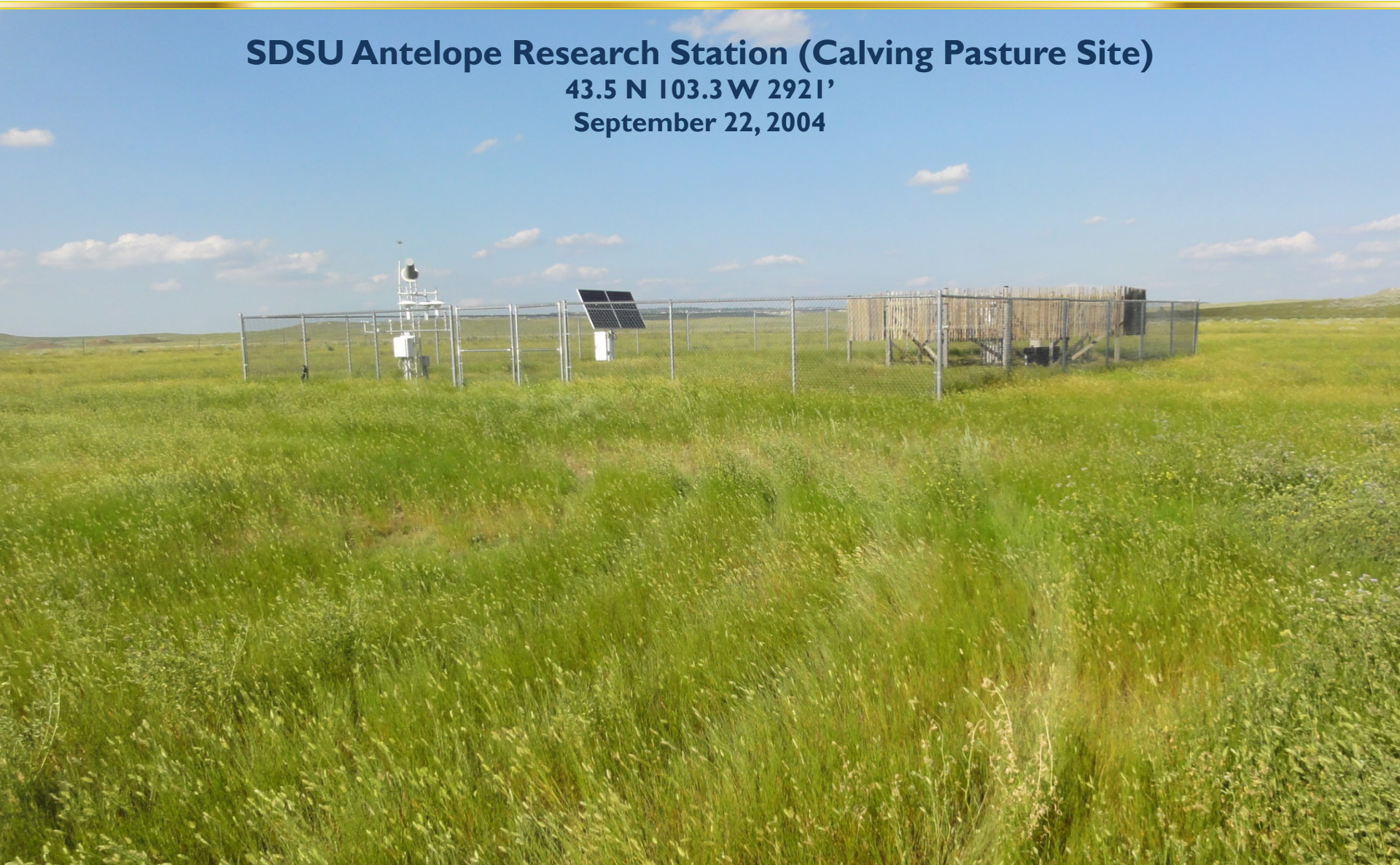
US Climate Reference Network

SD Aberdeen 35 WNW



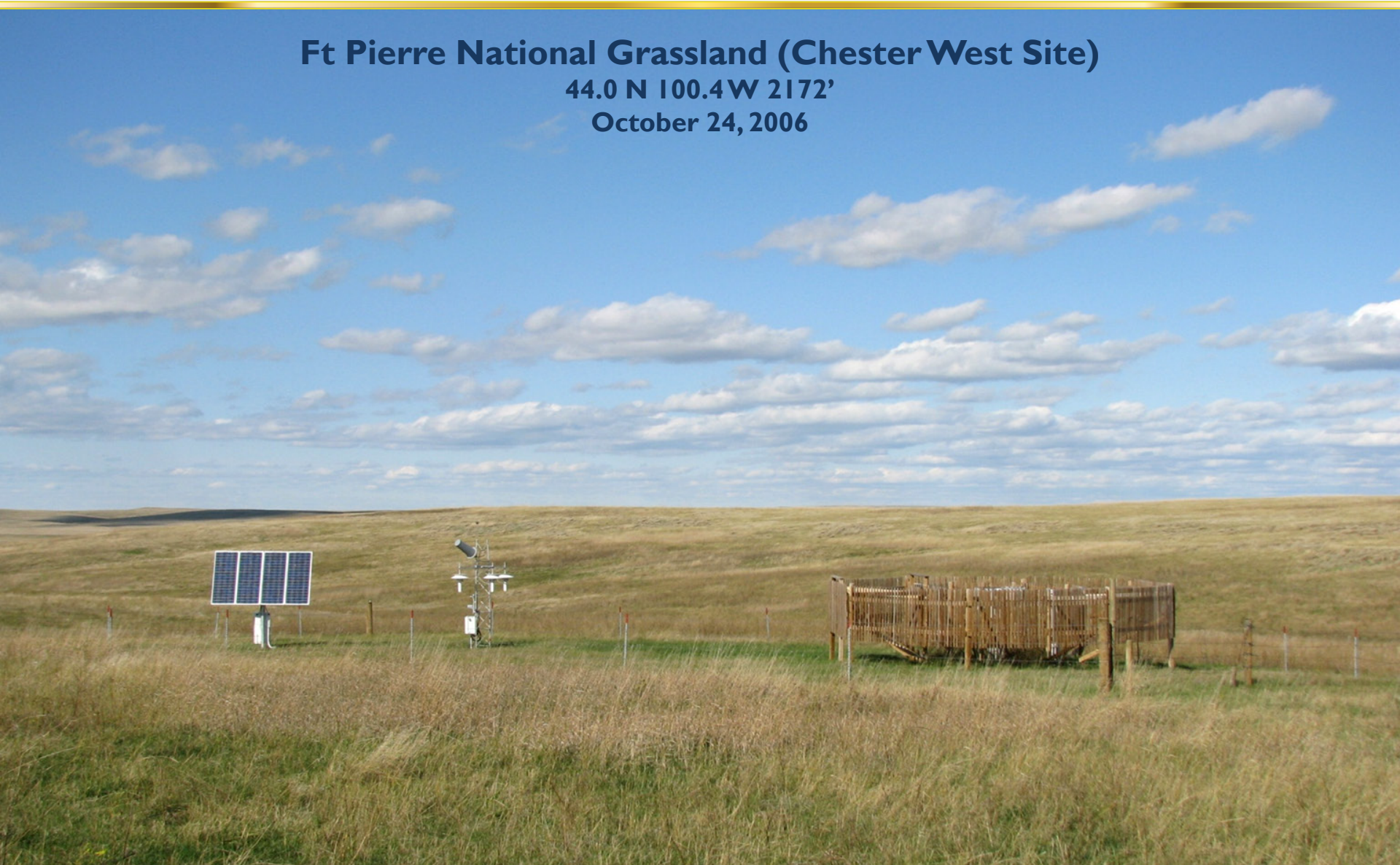
US Climate Reference Network

SD Buffalo 13 ESE



US Climate Reference Network

SD Pierre 24 S



US Climate Reference Network

SD Sioux Falls 14 NNE

EROS Data Center

43.8 N 96.9 W 1629'

September 25, 2002



US Climate Reference Network

TN Crossville 7 NW



US Climate Reference Network

TX Austin 33 NW



US Climate Reference Network

TX Bronte 11 NNE



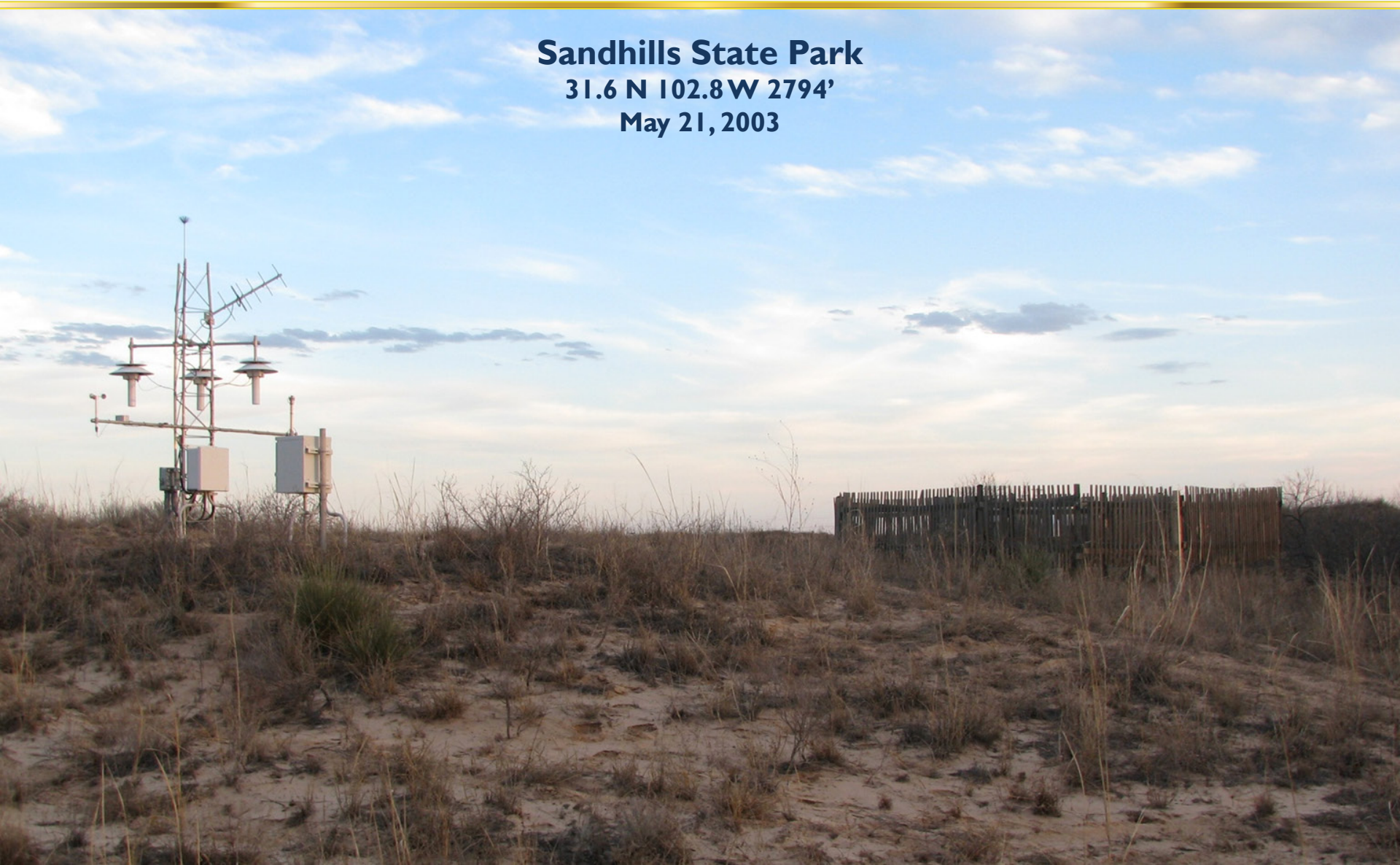
US Climate Reference Network

TX Edinburg 17 NNE



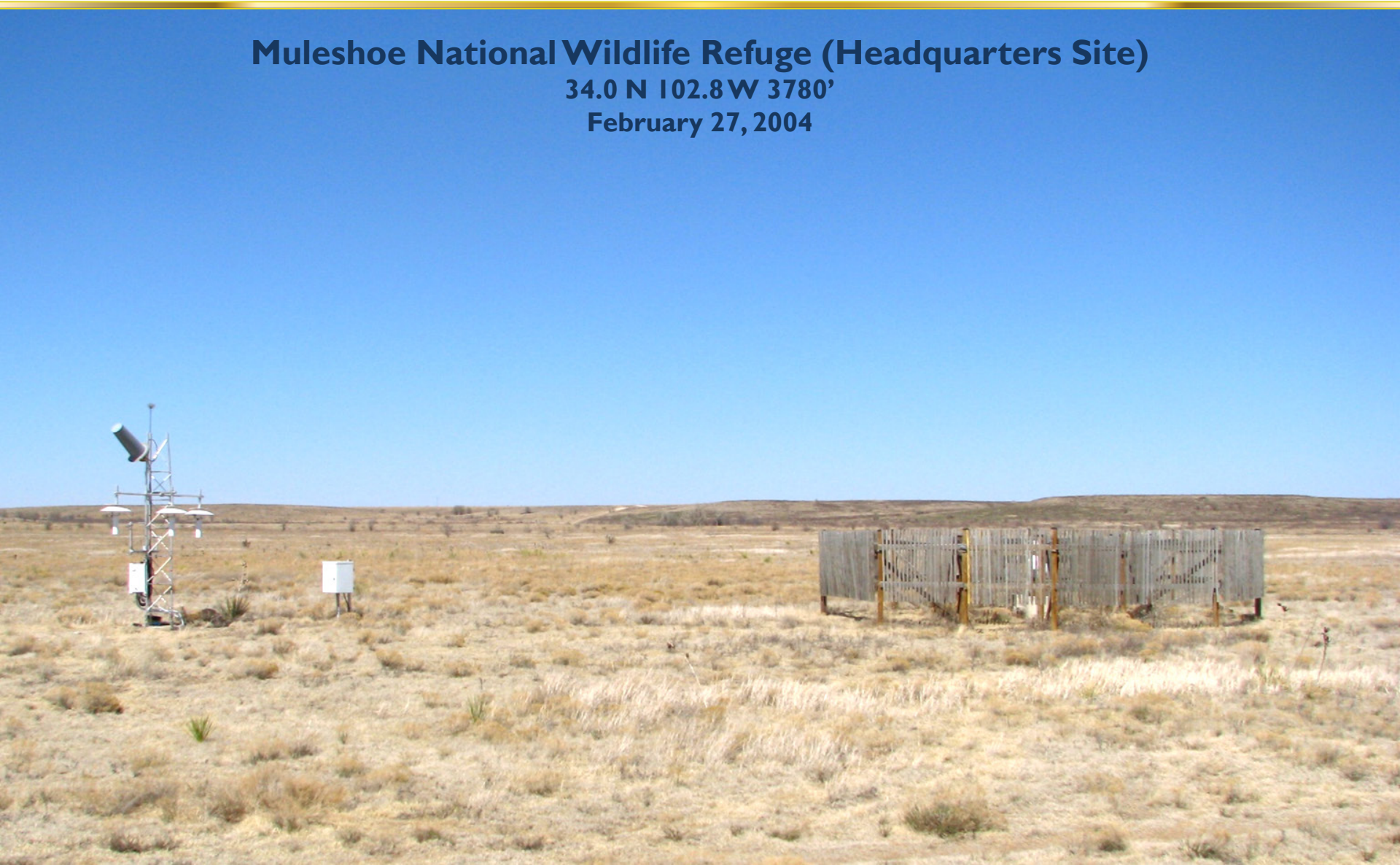
US Climate Reference Network

TX Monahans 6 ENE



US Climate Reference Network

TX Muleshoe 19 S



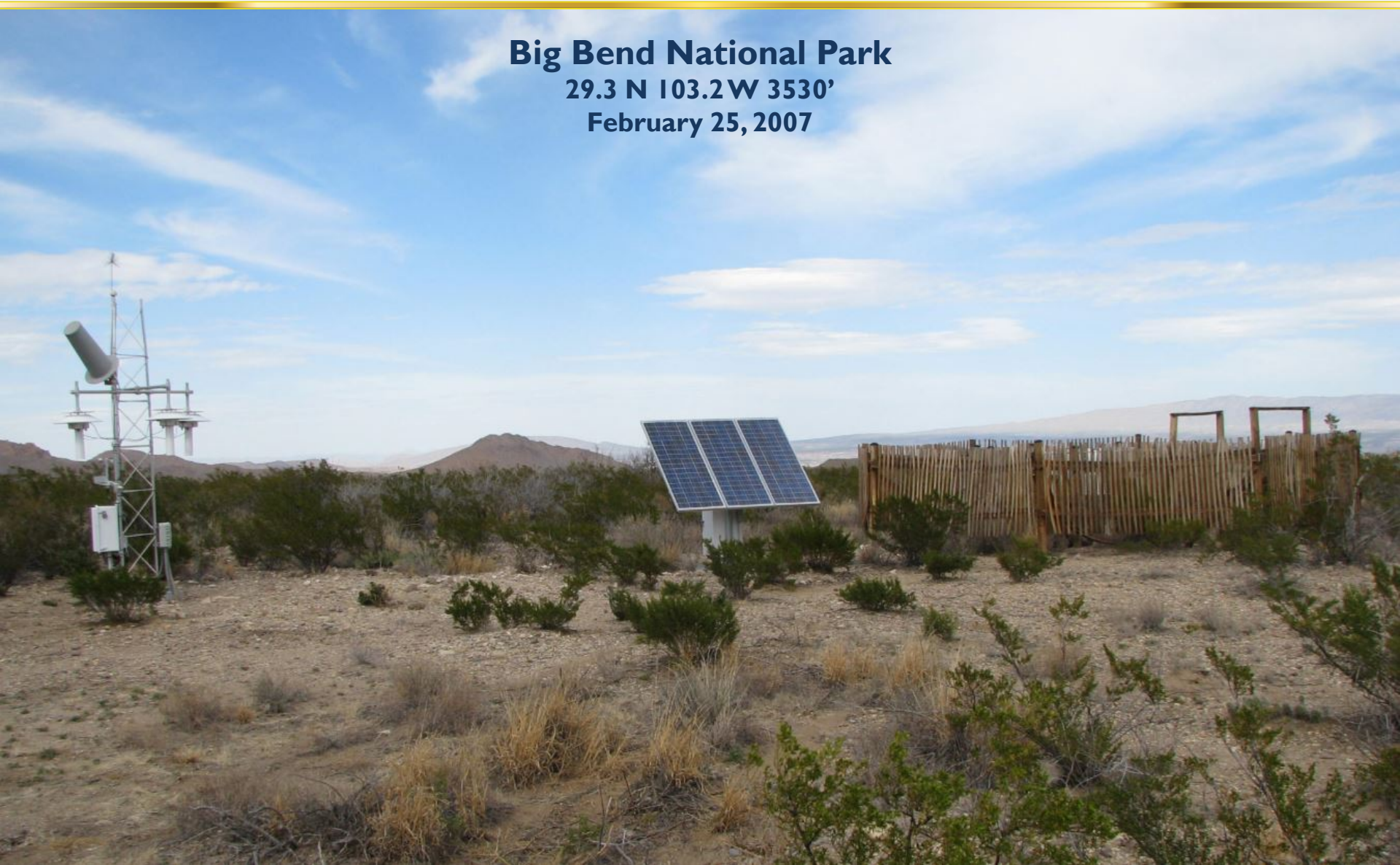
US Climate Reference Network

TX Palestine 6 WNW



US Climate Reference Network

TX Panther Junction 2 N



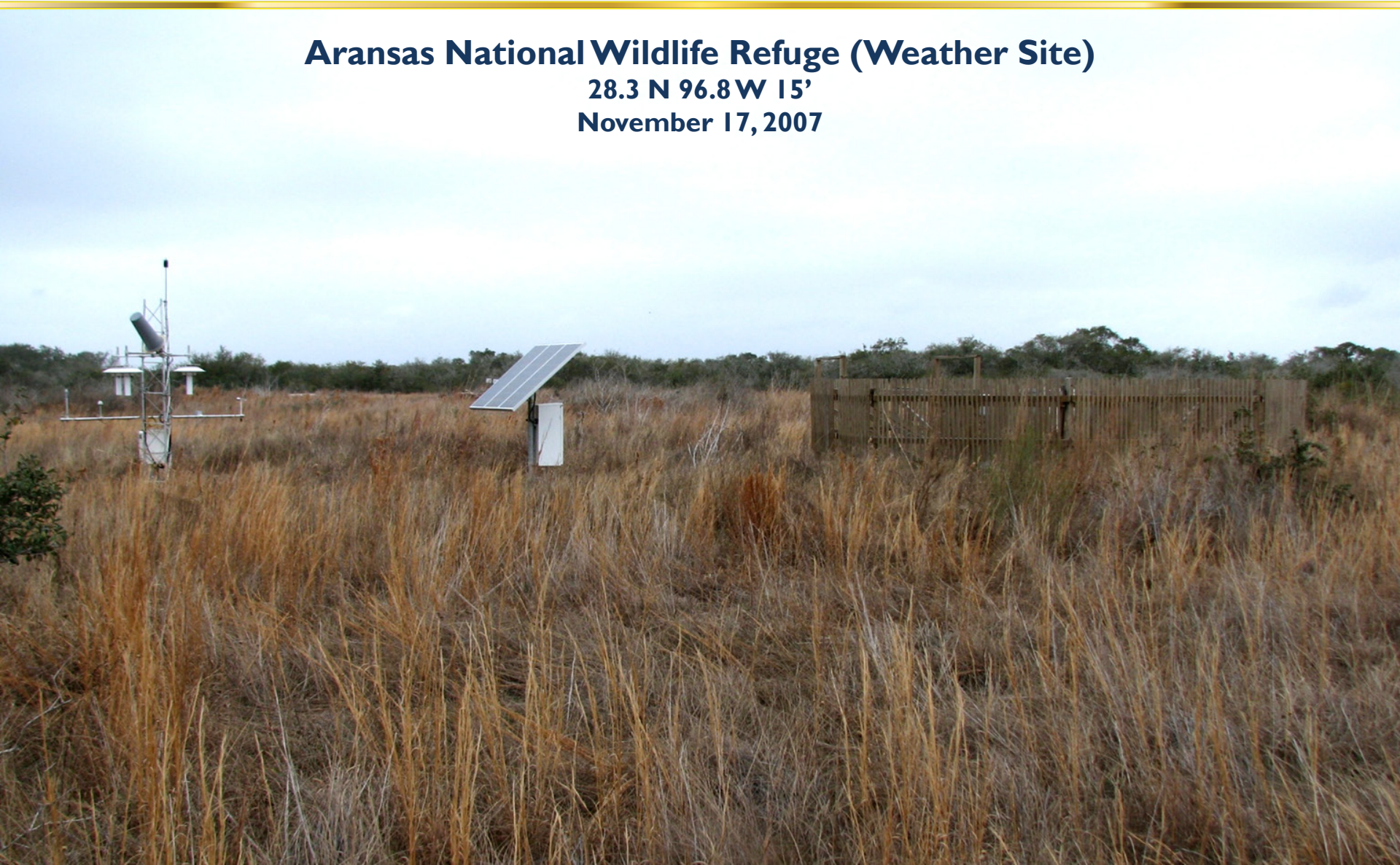
US Climate Reference Network

TX Port Aransas 32 NNE,

Aransas National Wildlife Refuge (Weather Site)

28.3 N 96.8 W 15'

November 17, 2007



US Climate Reference Network

UT Brigham City 28 WNW



Golden Spike National Historic Site

41.6 N 112.5 W 4938'

August 19, 2007

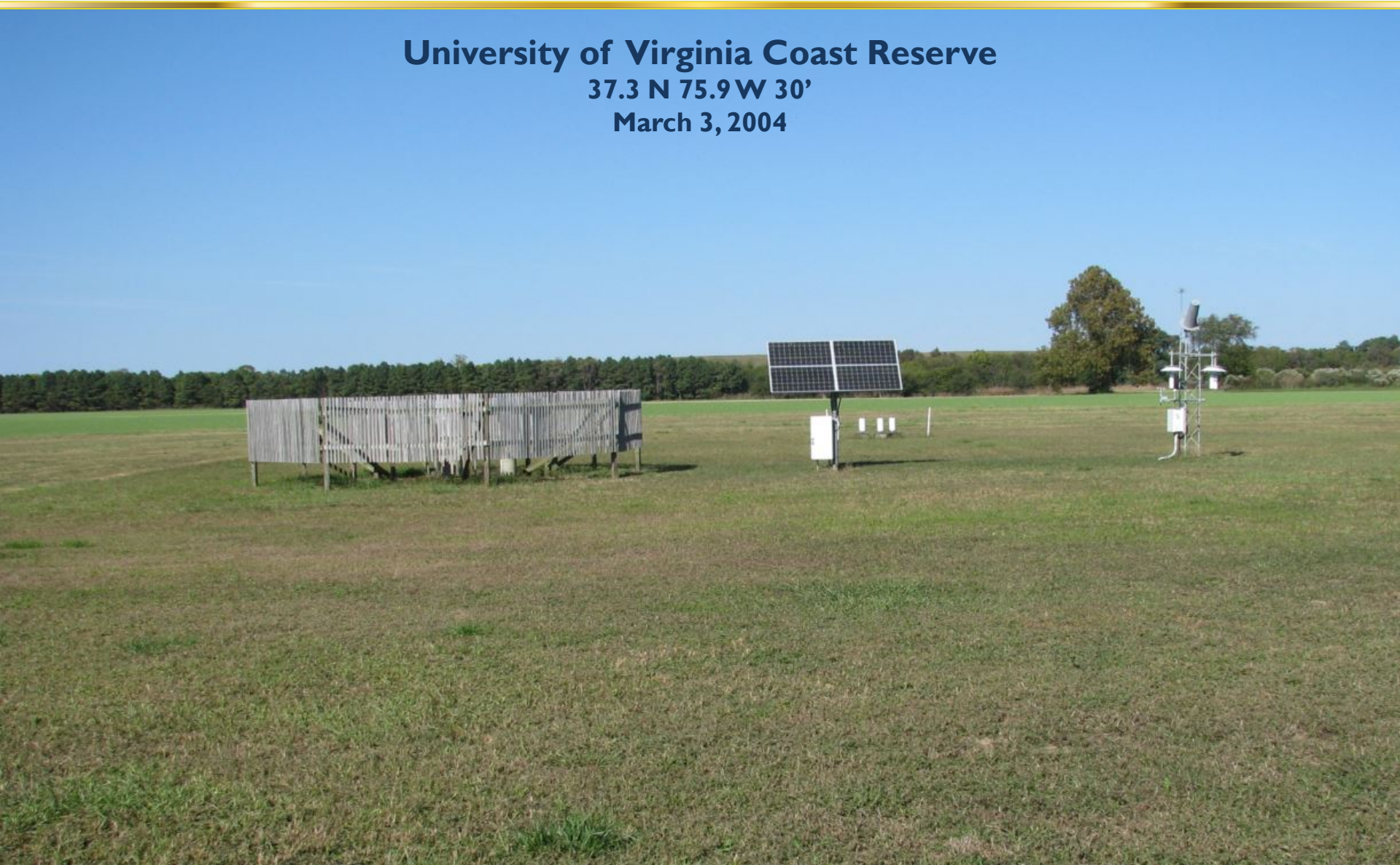
US Climate Reference Network

UT Torrey 7 E



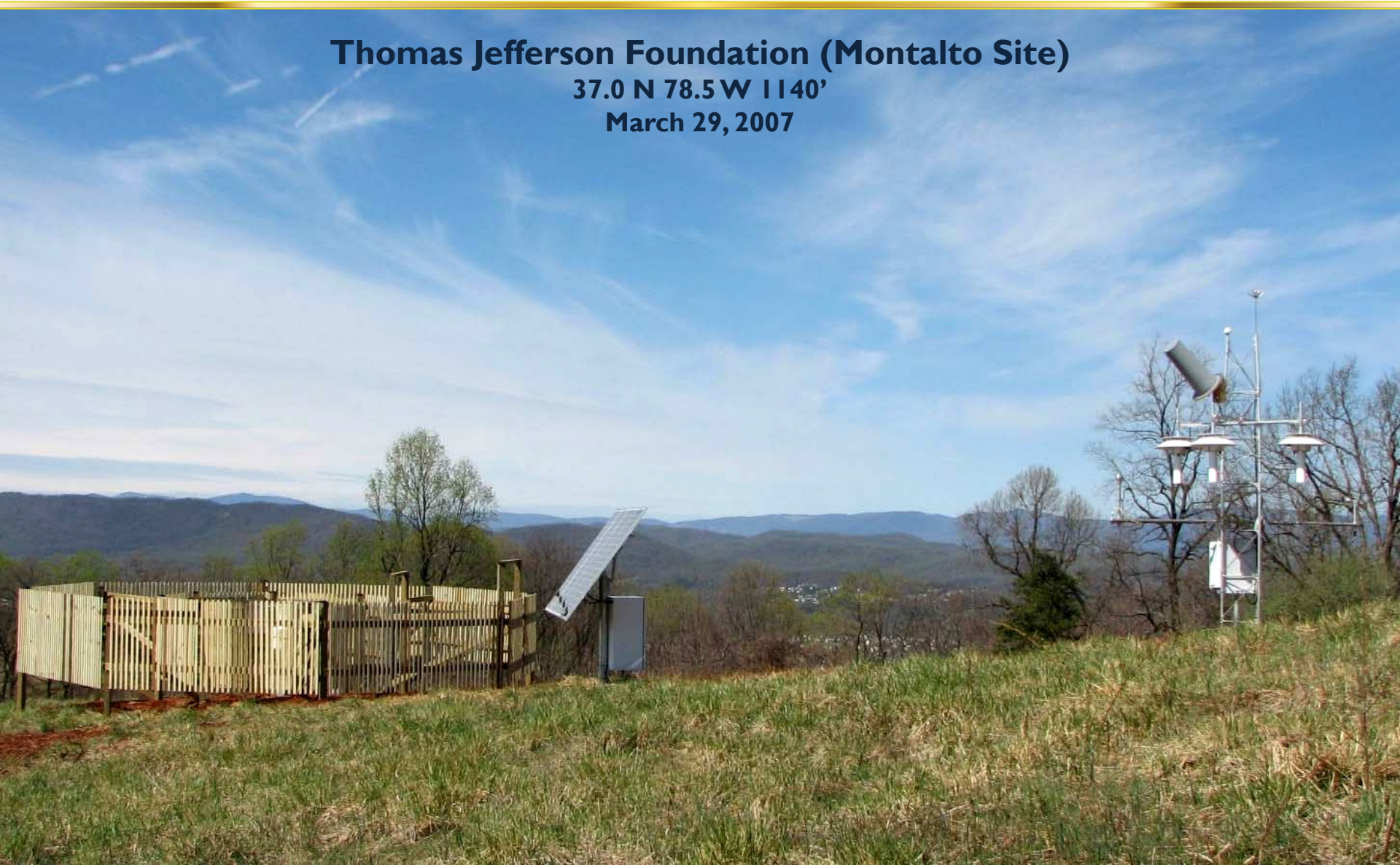
US Climate Reference Network

VA Cape Charles 5 ENE



US Climate Reference Network

VA Charlottesville 2 SSE



US Climate Reference Network

WA Darrington 21 NNE



US Climate Reference Network

WA Quinault 4 NE



US Climate Reference Network

WA Spokane 17 SSW



US Climate Reference Network

WI Necedah 5 WNW



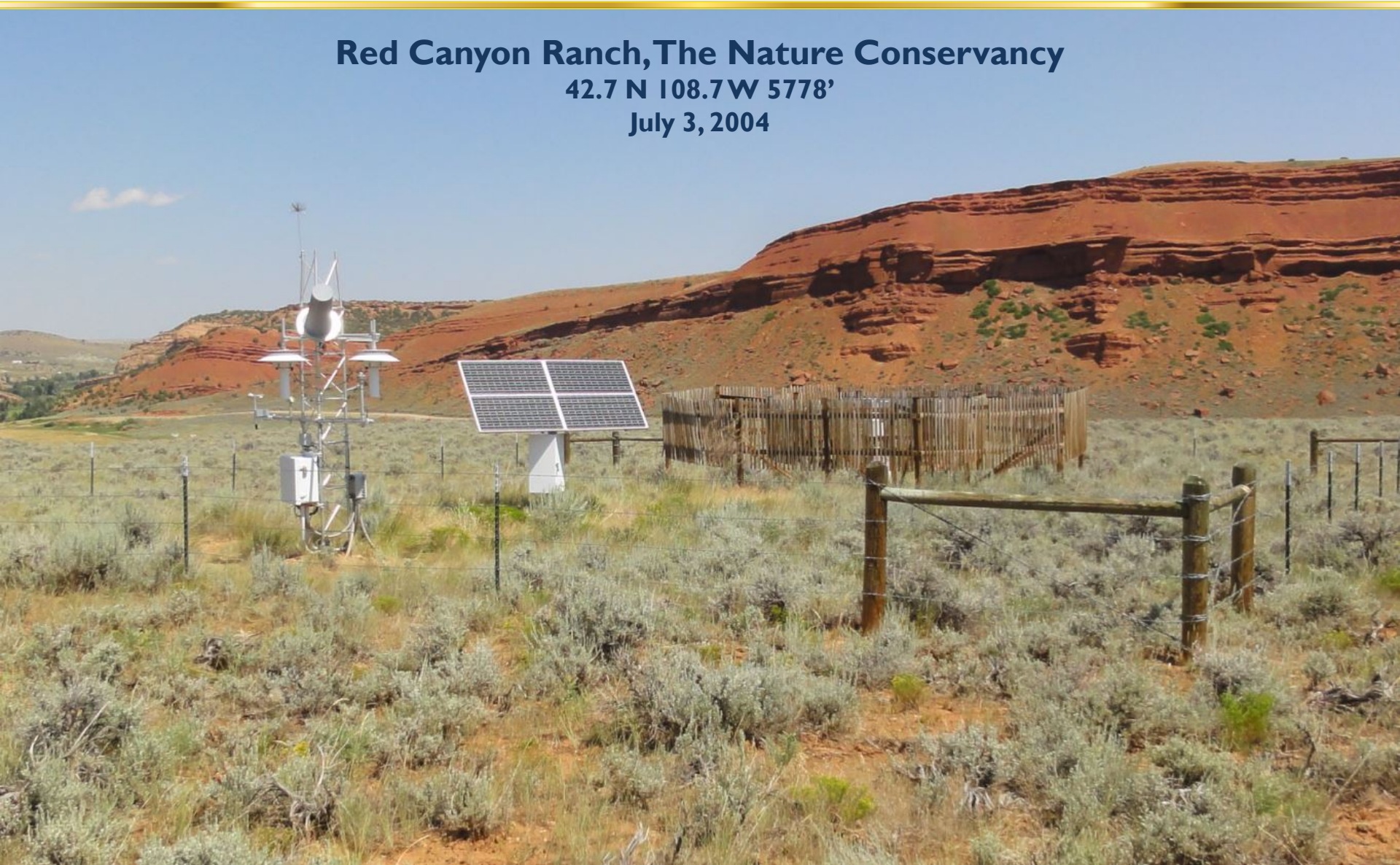
US Climate Reference Network

WV Elkins 21 ENE



US Climate Reference Network

WY Lander 11 SSE



US Climate Reference Network

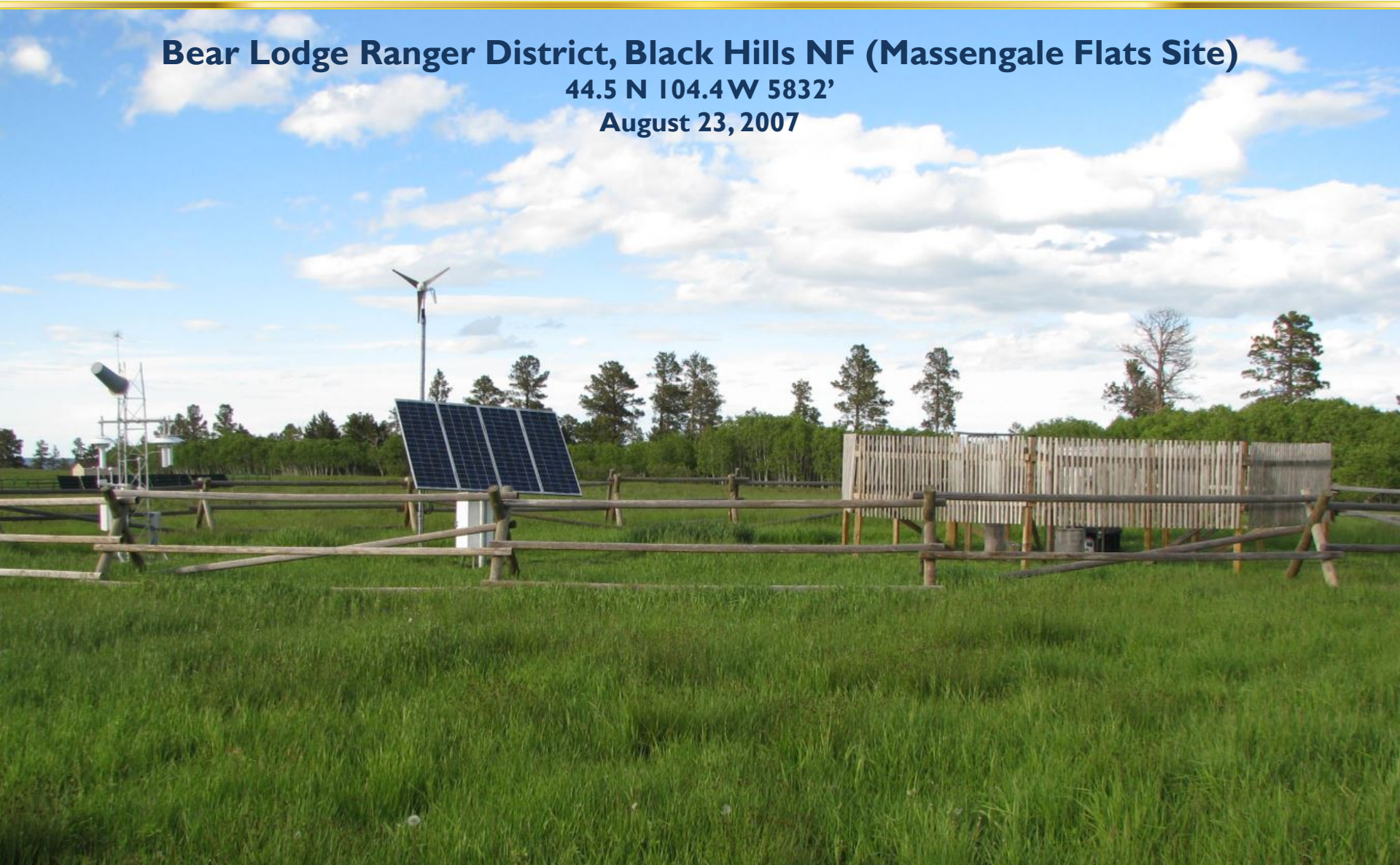
WY Moose 1 NNE



Grande Teton National Park
43.7 N 110.7 W 6478'
July 1, 2004

US Climate Reference Network

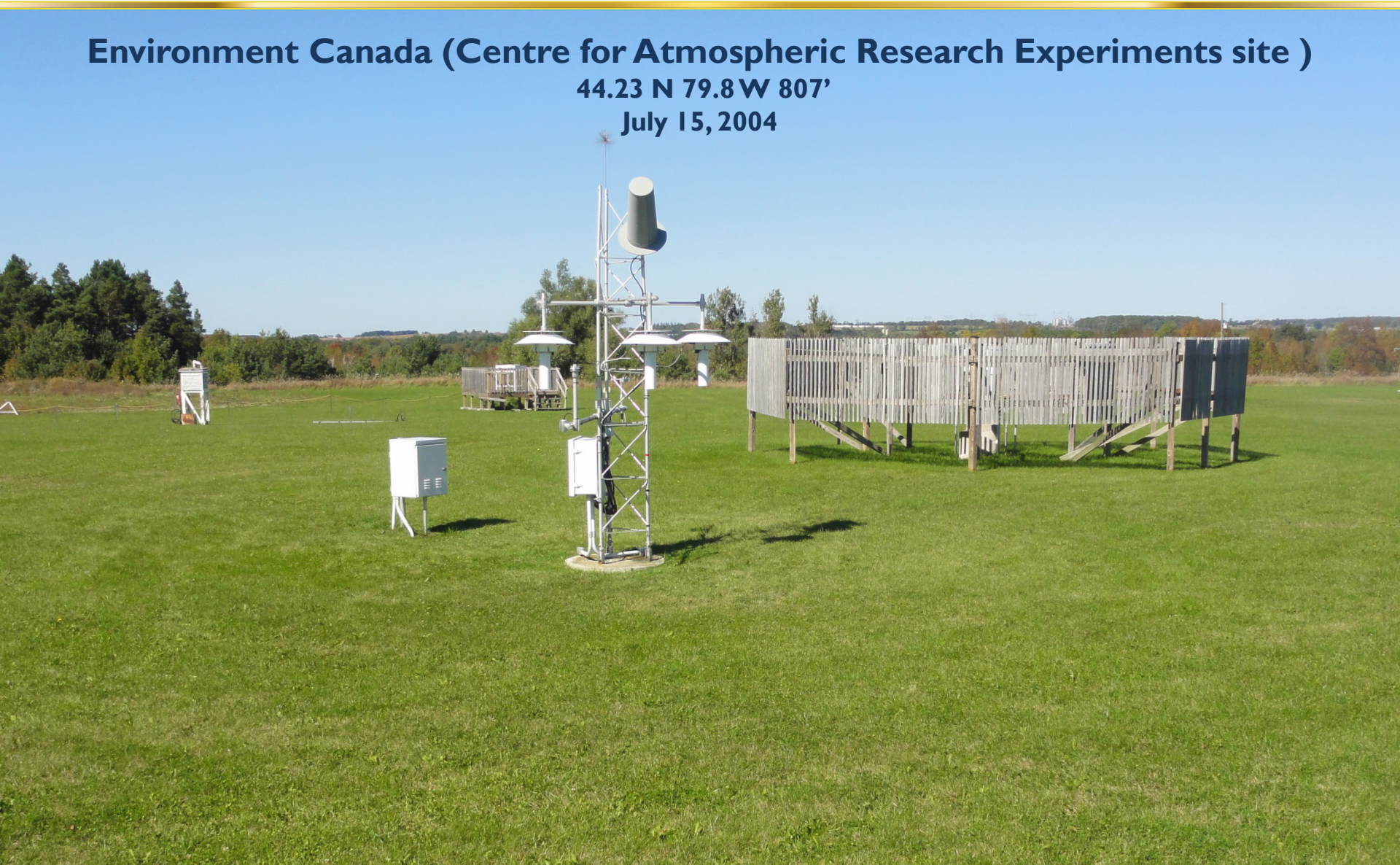
WY Sundance 8 NNW



US Climate Reference Network

Experimental

ON Egbert 1W



US Climate Reference Network

Experimental

SA Tiksi 4 SSE

